

CONVAIR Weekly Log

January 10, 1983

Published by the Convair Division of General Dynamics



ED MARTINEZ

Industrial Engineer
Industrial Engineering Systems
Lindbergh Field Plant
13 months at Convair

"Quality means doing what has to be done within specified quality constraints in the most efficient and cost productive manner. 'Nothing Short of Right Is Right' means satisfying quality and productivity variables to accomplish your goals."

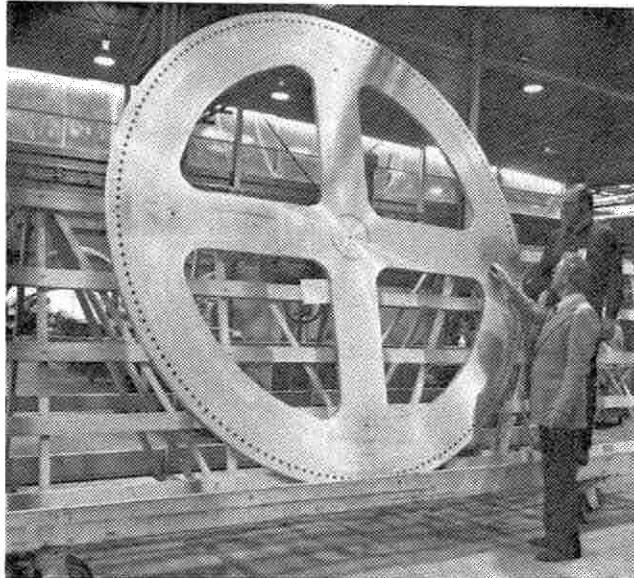
Nothing Short of Right Is Right!

Aircraft Programs Announce Major KC-10 Buy

The U.S. Air Force has signed a multiyear buy agreement with Douglas Aircraft Co. for 44 KC-10 aircraft. This is a major buy for the Air Force and is largely the result of the quality and high performance the KC-10 has demonstrated since it became operational. This buy should ensure KC-10 fuselage production here at Convair for the next four or five years, and it could increase our production rate in 1984.

Savings and Stock Plan Values for November

	1980	1981	1982
Salaried			
Government Bonds	\$ 2.4446	\$ 2.8071	\$ 3.3096
Diversified Portfolio	2.2079	2.1371	2.5804
Fixed Income	1.1448	1.2718	1.4172
Hourly			
Government Bonds	2.4424	2.8045	3.3076
Diversified Portfolio	2.2528	2.1824	2.6352
GD Stock	\$40.3750	\$23.2500	\$31.1300



Bob Bruce, manufacturing engineer, and M. Sliwinski, boring mill machinist, examine the master tool before it is shipped to NASA/Jet Propulsion Laboratory for use in drilling the Galileo spacecraft payload adapter interfacing bolt holes.

Shuttle/Centaur Major Tool Completed

Convair has completed fabrication of a master drill plate for use in drilling the bolt holes joining the Galileo and International Solar Polar Mission payloads to the forward Shuttle/Centaur support structure. The 180 holes are located on a 108.6-inch diameter within 0.002 inch of each other — less than the thickness of a human hair. The 750-pound, 10-foot-diameter, cast aluminum tool was designed, procured, and machined on schedule and within budget. It is the first item shipped on the newly acquired Shuttle/Centaur development and production contract with NASA.

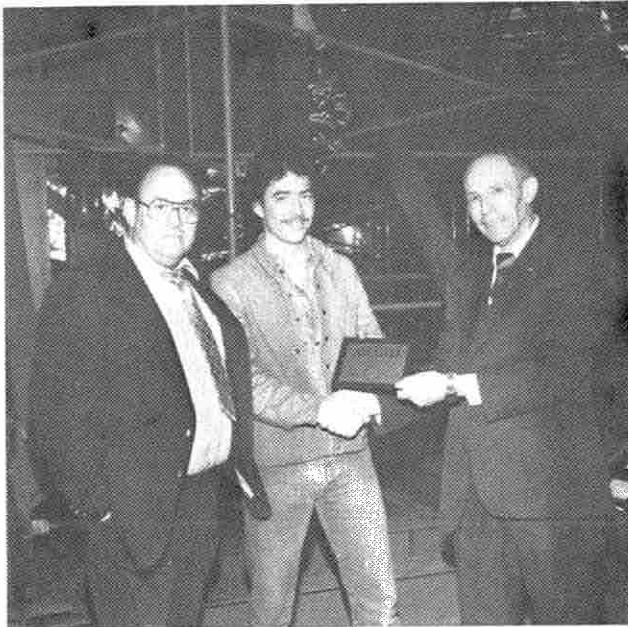
VAFB Celebrates Atlas 25th Anniversary

Convair employees at Vandenberg Air Force Base celebrated the 25th anniversary of the Atlas on December 20, when Atlas booster 60E launched the first satellite in a continuing series for the Defense Meteorological Satellite Program. This was the 469th Atlas launched and the 257th from Vandenberg. Over 300 Convair employees and guests attended the 25th anniversary celebration later that evening at the Lompoc Elks Club. Convair people touring the facilities, viewing the launch, and joining the evening festivities as special guests of Vandenberg were Howard Siegal, Evelyn Wallace, Will Yound, Ron Johnson, Glen Tuggey, Chuck Stroud, Ian Hollingsworth, Joe Pribilo, and Norm Butler.

Richard Adams to Speak at NMACC Dinner

Richard Adams, Convair's general manager, will talk about the present and future of the company in his

"State-of-the-Division" address at the NMA Convair Chapter dinner meeting Wednesday, January 19. The meeting will be held in the Champagne Ballroom of the Sheraton Harbor Island Hotel. Tickets are \$7.50 each for members and their spouses and \$13.50 for nonmembers. The evening begins with a social hour at 5:30 and continues with dinner at 6:30 and the program at 7:30. Prizes for the scholarship fund drawing promise to be outstanding. Watch for further details.



Employee Suggestion Award. R.I. Garrett (center), precision welder, receives a \$2,460 Employee Suggestion Award from H.C. Allison (right), general supervisor - Energy. Bruce Smith, supervisor - Energy, is also pictured. Garrett's suggestion to use a Reed sand-blasting machine resulted in significant labor and cost saving in the copper deburring operation on the large coil program.

They Retired in December

Thanks and best wishes go to each Convair employee who retired as of December 1, 1982.

Name	Department	Years of Service
Frank L. Dewey	229-0 Crafter & packer A	31
Frederick J. Hull	043-0 Group leader/LG6	41
Richard C. Huyett	613-0 Senior project engineer	28½
Andrew F. Hyland	985-1 Engineering specialist	26
Kenneth L. Klinge	046-0 Aircraft assembler S + S	18½
William McColley	512-0 Financial specialist	26
Carl F. Stark	431-0 Sr tool & operations planner	40
John H. Struthers	666-0 Group engineer	41
William L. Thomas	253-4 Custodian	12
Emily T. Winn	251-0 Operations supervisor plant services	19

New P.O. Box Numbers for Convair

Effective January 1, 1983, Convair was assigned new box numbers by the U.S. Postal Service.

Old Box Number	New Box Number
KM 80847 - General Box	85357
KM 80986 - Library (only)	85386
LF 80877 - General Box	85377
LF 80818 - Accounts Payable (only)	85318

The change from the old to the new numbers will cause no delay or interruption in mail service.

Main Post Office Tour. A one-hour tour of the Main Post Office on Midway Drive will begin at 6:00 p.m. on Tuesday, January 25. Register with Jan Lawrence at KM 1108 or 3324. The tour is limited to 50 people.

'Convairsations with Management' to Begin

NMA Convair Chapter is once again presenting a series of sessions with Convair management. The first of the 11 "Convairsations with Management" sessions will be conducted by John McSweeny, vice president and deputy general manager. He will present a brief summary of the Division Overview and Business Planning. Attendance is limited and enrollment will be determined by the order reservations are received. The first meeting will be held at KM in the presentation room of building 2 (main lobby) from 4:30 to 6:00 p.m., Tuesday, January 18. The course is offered free to all employees. For reservations, call Kathy Milhaud at KM 1803.

NMA Convair Chapter Current Offerings

Discussions for Learning. This six-week class begins Tuesday, January 11. It will be held in the FAC conference room in building 1 (mezzanine, column J-8) at Lindbergh Field. The hours are 4:30 to 6:30 p.m. The cost is \$10 for NMACC members (refundable upon successful completion) and \$15 for nonmembers. Enrollment is limited to 20. Frank Glenski will be the facilitator. Register with Chris Yates at KM 3096 or Jim Denzien at KM 3108.

Personal Skills for the Manager. This eight-week seminar will be held from 4:30 to 6:30 p.m. in KM building 26, second floor, column J-26, in the K-square conference room. The first meeting is Tuesday, January 11. This course is one of three in a complete revision of the previous Certified Manager series. Register with Judy Braun at KM 2849 or Chris Yates at KM 3096. The cost is \$15 for both NMACC members and nonmembers. Enrollment is limited to 15.

'Adopt-A-School' Program Needs Speakers

NMA Convair Chapter is looking for speakers for their Adopt-A-School program at Morse High School. If you do not have a specific topic but would like to be a guest speaker, NMACC has a list you can choose from. Please call Bill Greenwood at KM 6456 if you are interested or have any questions.

Employment

For the week ending December 24, 1982, employment was 9,556.

CONVAIR Weekly Log

January 17, 1983

Published by the Convair Division of General Dynamics

Quality Awareness



Front: Joe Moore, Bud Smith, Carolyn Wilson, Bob Kemp, Jan Lawrence, Julie Andrews, Emmett Capossere, Jim Stevens. Middle: Norm Rutherford, Tony Adams, Bill Ferebee, Gary Porter, Michele Tamayo, Will Goldsmith, Jim Woods. Rear: Al Ayala, Burt Brockett, George Blackshaw, John DeBlanc.

QUALITY CIRCLES

Art & Editorial Quality Circle Makes Presentation

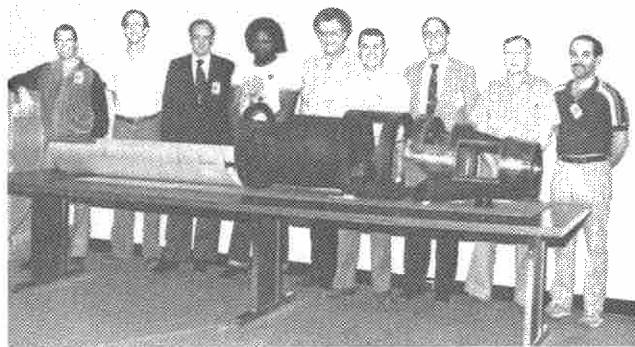
On January 11, Art & Editorial's quality circle, "The Squeaky Wheel," made its first presentation to management. The presentation recommended modifications to the work flow and redesign of an important internal form. The circle's proposal indicated a savings in time, more accurate charging, and more efficient service. The recommendations were approved by management, and the Squeaky Wheel was complimented on its professional presentation. This is not surprising, considering that Art & Editorial produces presentation visuals for many areas of the division.

Circle members making the presentation were Emmett Capossere, Jim Stevens, Carolyn Wilson, and Jan Lawrence. Members of the audience included George Blackshaw and John DeBlanc, Program Development; Augie Daddi, John Barrons, and Bruce Marshall, Industrial Relations; Jim Woods, Time-Audit; and supervisors and management of Art & Editorial.

Making a Difference

General Dynamics Night at Disneyland Is Feb. 26

Come join Convair staff and employees for a special party at Disneyland on Saturday, February 26, from 8:00 p.m. to 1:00 a.m. The \$7 per person price includes free parking, unlimited use of park attractions (except the Frontierland Shooting Gallery), live entertainment, and admission to all Disneyland shows and exhibits. Thirty rooms at Howard Johnson's Motor Lodge have been reserved at a discounted rate. For further information and tickets, call Jody at LF 8142.



MRASM people who made it happen (from left to right): Terry Davis, Paul Coffin, Jim Reed, Nate Purdy, Bob Brindle, Bob Cash, Ed Bock, Bill Gibb, and Joe Villa.

First MRASM Body Section Hardware

Our medium-range air-to-surface missile (MRASM) has received three major body section parts. The midbody lower skin (shown in photo) is CNC-machined by Convair from a weldment of two cylindrical aluminum forgings. MRASM's midbody is similar to Tomahawk's but incorporates substantial producibility improvements made possible by its lower range requirement. MRASM's aftbody and tailcone are each machined from single-piece, premium aluminum sand castings. The MRASM tailcone section is functionally similar to Tomahawk's but replaces 23 fabricated and machined parts with one machined integral casting.

767 Service to San Diego Inaugurated

TWA initiated 767 commercial service from San Diego to St. Louis on January 10, and American Airlines will follow with a San Diego-to-New York flight starting on February 23. TWA's remarkably quiet takeoffs can be observed at Lindbergh Field at approximately 7:55 a.m. each morning.

Convair manufactures engine struts (pylons), fairings, and interface systems for the 767 under a 400 shipset contract to Boeing. The 767 has proven to be 35 percent more fuel efficient than other medium-to-long-range jets, due in part to the use of strong, lightweight, advanced composite materials such as those Convair uses in the strut fairings. We have delivered 57 of the initial 400 shipset order through January 14.

Adams Presents State-of-the-Division Address

Mr. Adams will share with you where the division is now and where we are going in his presentation entitled "Convair: A Time of Transition and Challenge." His remarks will be made at the January 19 dinner meeting of the NMACC, at the Sheraton Harbor Island Hotel in the Champagne Ballroom. Social hour will begin at 5:30, dinner at 6:30, and the program will follow at 7:30. Tickets are available until today, January 17, from NMACC boosters at \$7.50 each for members and their spouses and \$13.50 for nonmembers. **No tickets sold after today.**

FLIP



Bruce Milton (center), inspector-Missile Assembly A, receives an EXCEL Citation Award for "outstanding professionalism, persistence, and attention to detail" from Rear Adm. Hostettler, Joint Cruise Missiles Program (right), while Michael C. Keel, vice president and program director, Cruise Missiles, looks on.

EXCEL Citation Awarded Missile Inspector Milton

On December 3, Bruce Milton exemplified the inspection motto "Look, Think, and Act." While inspecting T84 in the cruise missile final assembly area, he observed two conditions that caused him to be concerned, one involving protective covers on a fuel line, and the other, the engine T-2 sensor port. His subsequent investigation revealed that there was no hard planning callout for removal of protective caps. As a result, all missiles were checked to correct this condition that could seriously jeopardize a mission.



Graduation Ceremony. Recently, Convair employees of Dept. 039 who successfully completed training sessions on the orbiter mid-fuselage program joined together to celebrate. The training stressed new and revised techniques in quality and productivity. According to Don Evanson, training instructor, this training has resulted in reduced factory assembly discrepancies.

Main Post Office Tour

A one-hour tour of the Main Post Office on Midway Drive will begin a 6:00 p.m. on Tuesday, January 25. You can register with Jan Lawrence at KM 1108 or 3324. The tour is limited to 50 people.



NASA Presents Award. C.E. Wilson (left), Shuttle/Centaur program director, receives an award from W.H. Robbins, NASA Lewis Research Center, "in recognition of valiant dedication and inspired leadership in achieving the initiation of the Shuttle/Centaur program." Awards to non-NASA personnel are rare and constitute a true honor for outstanding contributions to NASA space programs. Congratulations!

'Convairsations with Management' To Start

The first of the 11 "Convairsations with Management" begins Tuesday, January 18, with John McSweeny, vice president and deputy general manager; and John Waszczak, director, Planning. Future sessions include George Blackshaw of Program Development on January 25 and Chuck Bohle of Finance on February 1. The sessions will be held from 4:30 to 6:00 p.m. in building 2 of presentation room at Kearny Mesa. They are free and open to all Convair employees. Register with Kathy Milhaud at KM 1803.

From the Health-Fitness Center

"The Un-Diet for '83" will be presented by noted speaker and author Candy Cummings January 18, 1983 in the Space Conference Room, Building 26, KM, from 4:45-6:00 p.m. This one-session seminar presentation is sponsored by the NMA and open to all Convair employees. Fee is \$5.00 and \$7.00 for nonmembers. To register, call Sue Fontaine at extension 1710. Enrollment is limited to 45.



THE GREAT TALENT SEARCH

S E C O N D E D I T I O N

Watch the Blue Sheet for the kick-off date and details of the improved GTS program.

Employment

For the week ending January 7, employment was 9,588.

CONVAIR **Weekly Log** January 24, 1983

Published by the Convair Division of General Dynamics



"The program gave me an opportunity to draw on business acquaintances and friends interested in coming to Convair. The contact made through the Great Talent Search is much more personalized than responding to an ad."

On January 5, special recognition awards for the Most Qualified Referrals were presented to Quentin Redman and Janet Polley, (unavailable for photo), and for the Most Hires to Robert Johnston.

For his special recognition award, Redman has already ordered a six-piece, wrought-iron patio set and a portable vacuum cleaner for his car. Johnston and Polley are still undecided, since there are so many selections available.

Professional Staffing thanks all those employees who participated in the program, which recruited 77 hires in 1982. Awards were presented throughout the year to almost 1,000 employees, both exempt and nonexempt, "in appreciation for their efforts in helping us attain our recruitment goals," stated Dennis Bartlett, Professional Staffing Administrator of GTS.



Front: Award winners Geoff Acton, Ed Beers, and Jeff Fell.
Rear: Marty Winkler, director of Avionics; Frank Puhek and Jack Fisher, Program Engineering chiefs; Jim Reed, MRASM chief engineer, and Dan Da Pra, Vice President Research & Engineering.

MRASM Engineers Receive Achievement Awards

Three MRASM Avionics engineers, Geoff Acton, Ed Beers, and Jeff Fell, have each received \$1,000 merchandise awards in recognition of their efforts to build and check out the prototype MRASM air vehicle computers.

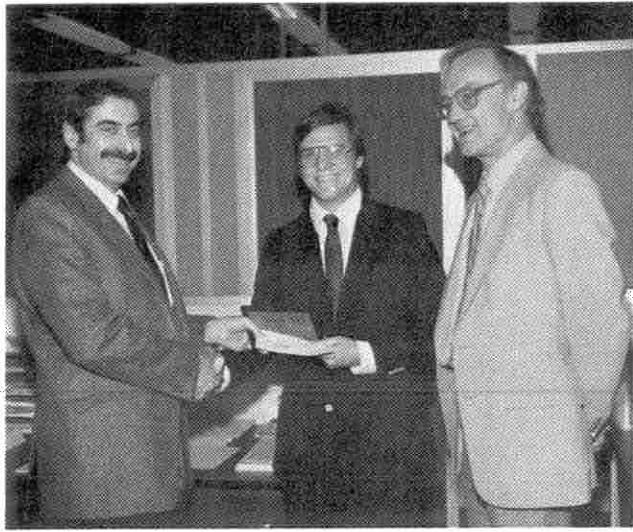
MRASM air vehicle computers consist of a guidance and navigation computer (GNC), a mission control module (MCM), and a test instrumentation controller. The computers have been completely designed by GD/C and are based on DIS technology. The effort started in March 1982 and will be complete in May 1983, with the delivery of the sixth set of computers.

Jeff Fell is responsible for overall assembly of the computers, Ed Beers for troubleshooting and debugging, and Geoff Acton for test station software and integrating the computers and test station.

The award was given in recognition of the extra effort and extended days and weeks they worked throughout the entire year.

Thanks a lot and congratulations.

FLIP



Linden Brooks (center) receives a \$2,429 Employee Suggestion Award from Tom Sammon (left), acting director — Test & Evaluation, while Al Cappelen, chief — Data Requirements and Evaluation, looks on. Brooks' suggestion to convert the Instrumentation Master Files to modern Fortran language programs resulted in significant labor and computer-use saving.

Work Breakdown Structure Brochures

The latest editions of the Cruise Missile WBS Brochures (also known as the pink, yellow, blue, and green cards) are now available. All employees who need the brochures are invited to submit an AVO request to Dave Happ at MZ 84-1931.

Employee Stores Sale on February 5

The Employee Stores sale will be held on February 5 at the LF salvage yard from 8:00 a.m. to noon. Employees may bring one guest. No pets, no children under 15, no open-toed shoes are allowed. Some file cabinets, desks, chairs, and saxon copiers are available.

Credit Union Hours Extended

Point Loma Federal Credit Union's main office on Sports Arena Boulevard has extended afternoon hours as follows:

	Lobby	Drive-Through
Mon. — Thurs.	9:30 — 4:30	9:00 — 4:30
Friday	9:30 — 5:30	9:00 — 5:30
Saturday	9:00 — 1:00	9:00 — 1:00

'Convairsations with Management'

The first 'Convairsation' of the 1983 series was held last Tuesday. John McSweeny and John Waszczak presented division status and business planning and conducted a lively, hour-long question-and-answer period.

The next three scheduled sessions are: January 25, George Blackshaw of Program Development; February 1, Chuck Bohle of Finance; and February 8, Augie Dad-di of Industrial Relations.

All sessions are held from 4:30 to 6:00 p.m. in the KM building 2 presentation room. They are free and open to all Convair and Western Center employees. Space is limited, so please register for each session you plan to attend by calling Kathy Milhaud or Helen Duty at KM 1803.

GLCM Overseas Assignments Available

A GLCM technical support team is now being formed for location in Greenham Common, England. Positions to be filled are listed below.

- Logistics Specialist Senior
- Senior Engineers (BSEE, Electronics, Computer Communications, or ME with strong EE background)
- Engineering Documentation Specialists
- Field Service Maintenance Assistants
- Field Service Quality Assurance Assistants

Employees with experience in the indicated classifications are encouraged to check the current PEP Bulletin or call KM 6128 for information regarding these positions.

NMA Convair Chapter Current Offerings

Night at Fiesta Dinner Theater. "They're Playing Our Song" by Neil Simon and music by Marvin Hamlisch is featured at the Fiesta Dinner Theatre on Thursday, March 3. Tickets are \$16.00 per person. The price includes buffet dinner and show, with seating in the center section. Dinner starts at 6:30 p.m., and the play at 8:15 p.m. Ticket cut-off is February 15. For ticket reservations, call Dottie Brugger at LF 8327.

Investment Strategies for the 80s. Investment Strategies for the 80's. This three-session financial planning seminar will be presented by Craig Grosvenor on February 2, 9, and 16 in KM K-square conference room, building 26, from 4:45 to 6:00 p.m. Enrollment is limited to 20 people. Register with Sue Fontaine at KM 1710.

Main Post Office Tour. A one-hour tour of the Main Post Office on Midway Drive will begin at 6:00 p.m. on Tuesday, January 25. Register with Jan Lawrence at KM 1108 or 3324. The tour is limited to 50 people.



THE GREAT TALENT SEARCH SECOND EDITION

Watch the Blue Sheet for the kick-off date and details of the improved GTS program.

Employment

For the week ending January 14, employment was 9,604.

CONVAIR Weekly Log

January 31, 1983

Published by the Convair Division of General Dynamics



ANNE KELLY

Secretary
Cost Accounting
Lindbergh Field Plant
23 years at Convair

"Quality is doing a job to the best of your ability. 'Nothing Short of Right Is Right' means taking pride in what you have done, so you end up with a feeling of accomplishment by the end of the day."

Nothing Short of Right Is Right!

Adams' State-of-the-Division Address

If you didn't have an opportunity to attend this timely, informative presentation, you can see a 45-minute videotape of it, conveniently scheduled over the next two weeks. For this week, showings will be as follows:

- LF: Wednesday, February 2, Engineering Auditorium, 11:00 a.m. and 4:00 p.m.
- Thursday, February 3, Engineering Auditorium, 11:00 a.m. and 4:00 p.m.
- KM: Friday, February 4, building 2, Presentation Room, 11:30 a.m. and 4:00 p.m.

Please watch the Weekly Log for announcements of future showings. For additional information, call KM 1525.

Mail Room and Distribution Center to Move

Effective Monday, February 7, both the Mail Room and the Distribution Center will be relocated in building 5, first floor, between columns J-13 and J-15.

The Great Talent Search - Second Edition

In February 1982, we initiated the Great Talent Search program to give Convair employees an opportunity to personally assist in the recruitment of people with the engineering skills we needed. The program was so successful that we are launching the Second Edition of GTS, with expanded merchandise awards and levels of recognition. Again in 1983, we are faced with the continued task of hiring many people to fill our key personnel requirements.

Especially difficult to acquire is experienced engineering talent, which must be sought out nationwide and whose availability is less than the industry's demand. General Dynamics Convair Division and San Diego have much to offer an individual. All employees will receive program details and a promotional item from their supervision later this week. Pick up a program brochure at the posters located in employee canteen areas throughout our facilities or in the GTS drop boxes at entrances to the plant. Discover how the Great Talent Search - Second Edition can pay off for you! Call Professional Staffing at KM 6331 for further information.

Savings and Stock Plan Values for December

	1980	1981	1982
Salaried			
Government Bonds	\$ 2.4964	\$ 2.7892	\$ 3.3649
Diversified Portfolio	2.1720	2.0894	2.5504
Fixed Income	1.1547	1.2834	1.4313
Hourly			
Government Bonds	2.4943	2.7866	3.3630
Diversified Portfolio	2.2163	2.1335	2.6045
GD Stock	\$42.7500	\$24.5000	\$33.0000

NMACC Scholarship Applications Available

Application forms for the NMA Convair Chapter Management Association Scholarship Program are now available. Here are the eligibility requirements in brief: applicants must be high school seniors graduating this June or recent graduates; applicants must be in the upper third of their class; a parent or legal guardian must work at Convair or Western Center at the time of application. The scholarship program is open to qualified students of all employees, and membership in NMA is not a requirement. The deadline for submitting applications is 31 March 1983.

Call KM 8037, or forms can be picked up at the following locations:

- LF: Educational Services, building 16
- KM: Educational Services, building 17, NE corner

NMA Convair Chapter Current Course Offerings

Leadership Development. This is course number 8 in the First-Line Supervisor program. Learn what style of leadership you employ and how it affects your relationship with others. You will also learn how to monitor and control the flow of information between yourself and others. The seven-week class begins Wednesday, February 9, and will be held from 4:30 to 6:30 p.m. in KM building 26, second floor, column J-17, in the Think Tank conference room. The cost is \$10 for NMACC members (refundable upon successful completion) and \$15 for nonmembers. Enrollment is limited to 20. Nancy Kimerly will be the facilitator. Register with Chris Yates at KM 3096 or Jim Denzien at KM 3108.

Successful Writing. Beginning Wednesday, February 2, this eight-week class will cover writing skills for the manager, as well as teaching techniques to improve subordinates' writing skills. The class will be held from 4:30 to 6:30 p.m. in LF building 1, mezzanine floor, column J-9, in the FAC conference room. The cost is \$10 for NMACC members (refundable upon successful completion) and \$15 for nonmembers. The facilitator will be Dave Clausen. Enrollment is limited to 20. Register with Chris Yates at KM 3096 or Jim Denzien at KM 3108.

They Retired in January

Thanks and best wishes to each of these Convair employees who retired in January 1983.

Name	Department	Years of Service
Frank W. Adams	332-0 Inspector-qual. control	38½
Robert J. Altmore	043-0 Aircraft assembler-S+SA	5
Cleo Blake	253-2 Custodian	32
Donald L. Blanchard	985-4 Senior quality engineer	26
Manuel F. Botelho	463-1 Tool crib attendant	13½
George L. Burst, Jr.	234-0 Prod. audit analyst	31½
Myron A. Caldwell	250-5 Crane rigger	22
Barbara G. Clute	641-0 Secretary	23½
James J. Curci, Jr.	355-0 Manufacturing engineer	35½
Emanuel A. DiGiulio	663-0 Senior engineer	40
John H. Gahagan	225-1 Group leader	31½
Gordon L. Getline	602-0 Sr engineering specialist	28
Manuel F. Gonzales	431-0 Tooling supervisor	38½
DeWitt J. Haldeman	031-0 Instrumentation machinist	31½
Howard M. Harvey	643-0 Senior engineer	30
Arleatha S. Helton	541-0 Keyprocessing operator	30
James W. Hudson	455-0 Welders group leader	32½
Arnold M. Kess	015-0 Milling mach operator A	3½
Joseph F. Martinez	761-0 Final missile painter	35
John W. McCoy	253-1 Plumber	13
Doris S. Passenheim	190-1 Sr accounting analyst	33
John G. Pequeno	049-0 Aircraft assembler-S+SB	18
James J. Schiller	001-0 Operations gen supvr	36
Ferdinand Slonina	332-0 Quality control inspector	39
Emil S. Slovacek, Jr.	067-0 Aircraft assembly-S+SA	34
Lowell F. Vought	232-0 Stock clerk A	32
Jesse W. Ward	759-0 Group leader	30
Eugene D. Wilson	350-0 Missile final assy inspt	22
George R. Zimmerman	049-0 Aircraft assembler	12

Income Tax Forms

State and Federal tax forms are now available at Kearny Mesa in the lobby of building 2 and at the Employee Benefits Office at Lindbergh Field.

Those needing Federal tax forms should note that we have been provided only the worksheets, and no instruction booklets. If you need an instruction booklet, call the Internal Revenue Service at (800) 242-4585.

Art & Editorial Services Require an AVO

If you request services from Art & Editorial, you must now have a completed AVO before a job can be initiated. The following information must be contained in the AVO: requestor's name, department number, and extension; the description of the job and number of pieces involved; review dates and due dates; and accurate charge numbers. The enforcement of the AVO requirement comes from an action by "The Squeaky Wheel," Art & Editorial's quality circle. It will help to expedite jobs and ensure correct charging within the division.

From the Health-Fitness Center

Shape-Up. Start the New Year off right! Join Shape-Up, a complete program of individual exercise, nutrition, stress management and a Shape-Up workbook for the seven-week course. The first class of the year will be on Monday, January 31, from 4:30 to 5:30 p.m. The class is free for HFC members and \$40 for nonmembers. Preregistration is suggested, so contact the Health-Fitness Center at KM 3567.

Stop Smoking. Take charge of your smoking. Making a new life that excludes cigarettes is no easy task. It takes considerable time, incentive, and practice. The Health-Fitness Center is offering a Stop Smoking program that can help you achieve a new lifestyle without cigarettes. The class begins February 7 at 4:45 in Room B. Fees are \$40 for nonmembers and \$37 for HFC members.

Slimmercize. This ongoing exercise program combines stretching techniques and floor exercise with music. The class meets on Monday, Wednesdays, and Fridays from 4:30 to 5:30 p.m. in Room A at the CRA clubhouse. The cost is \$20 for HFC members and \$25 for nonmembers for five weeks. Bonus: Pay for ten weeks and get five weeks free.

Join The Health-Fitness Center. The yearly membership is only \$80 (\$115 for a family of two) and can be payroll deductible. Membership includes use of the coed and separate womens' gym, one fitness profile per year, an exercise prescription, Shape-Up class for the year, and a 20% discount off the classes offered for a fee. You may register at the Health-Fitness Center between the hours of 9:00 a.m. to 1:00 p.m. and 2:00 to 6:00 p.m., or call KM 3567 for more information.

General Dynamics Night at Disneyland Is Feb. 26

Come join Convair staff and employees for a special party at Disneyland on Saturday, February 26, from 8:00 p.m. to 1:00 a.m. The \$7 per person price includes free parking, unlimited use of park attractions (except the Frontierland Shooting Gallery), live entertainment, and admission to all Disneyland shows and exhibits. Thirty rooms at Howard Johnson's Motor Lodge have been reserved at a discounted rate. For further information and tickets, call Jody at LF 8142.

Employment

For the week ending January 21, employment was 9,632.

CONVAIR Weekly Log

February 7, 1983

Published by the Convair Division of General Dynamics

Quality Awareness**'Tomahawk Yes' Presentation Available**

Wes Magnuson, former Convair employee and currently a consultant, has put together a motivational presentation on the Tomahawk program. It uses the film "No Shortcut to Perfection," written and produced by the Motion Pictures & Television

Department last fall. The presentation is targeted toward the over 2,200 suppliers who support the Tomahawk program. The objective is to encourage teamwork and quality awareness by educating our suppliers about the important part they play in this top-priority defense program.

The presentation speaks to us at Convair as well. The exciting film and Magnuson's inspiring message about the Tomahawk may be of value in your area. If you would like to find out more about scheduling this presentation, call Motivational Programs, KM 2256.

Making a Difference**Adams' State-of-the-Division Address**

This week the videotape presentation will be shown as follows:

KM: Monday, February 7, Cafeteria, 11:00 a.m., 11:45 a.m., and 4:00 p.m.

Tuesday, February 8, Cafeteria, 11:00 a.m. and 11:45 a.m.

LF: Wednesday, February 9, building 14 Auditorium, 11:00 a.m.
Thursday, February 10, building 14 Auditorium, 11:00 a.m.

Separate arrangements for showings at Plant 19 are currently being made. Please watch the Weekly Log for further details.

General Dynamics Night at Disneyland Is Feb. 26

Join Convair staff and employees for a special party at Disneyland on Saturday, February 26, from 8 p.m. to 1 a.m. The \$7 per person price includes free parking, unlimited use of park attractions (except the Frontierland Shooting Gallery), live entertainment, and admission to all Disneyland shows and exhibits. Thirty rooms at Howard Johnson's Motor Lodge have been reserved at a discounted rate. For further information and tickets, call Jody at LF 8142.

Contract Awarded for Additional Atlas/Centaur

Howard Bonesteel, program director, and Bob Benzwi, mission manager, of the Atlas/Centaur Program report that Convair has just received an order to produce three additional Atlas/Centaur vehicles for launching FLTSATCOM satellites. This is a follow-on to the successful launching of five FLTSATCOM satellites in 1978-81, and will involve production and launch activities through 1987.

The three new Atlas/Centaur vehicles are scheduled to fly FLTSATCOM satellites in 1985, 1986, and 1987. FLTSATCOM satellites are the spaceborne portion of a worldwide Navy, Air Force, and Department of Defense communications system that enables communications among aircraft, ships, submarines, ground stations, the Strategic Air Command, and the President's command network. The current orbiting satellites along with the additional three will provide ongoing global communications coverage.

NMACC Scholarship Applications Available

Application forms for the NMA Convair Chapter Management Association Scholarship Program are now available. Here are the eligibility requirements in brief: applicants must be high school seniors graduating this June or recent graduates; applicants must be in the upper third of their class; a parent or legal guardian must work at Convair or Western Center at the time of application. The scholarship program is open to qualified students of all employees, and membership in NMA is not a requirement. The deadline for submitting applications is 31 March 1983.

Call LF 8037, or forms can be picked up at the following locations:

LF: Educational Services, building 16

KM: Educational Services, building 17, NE corner

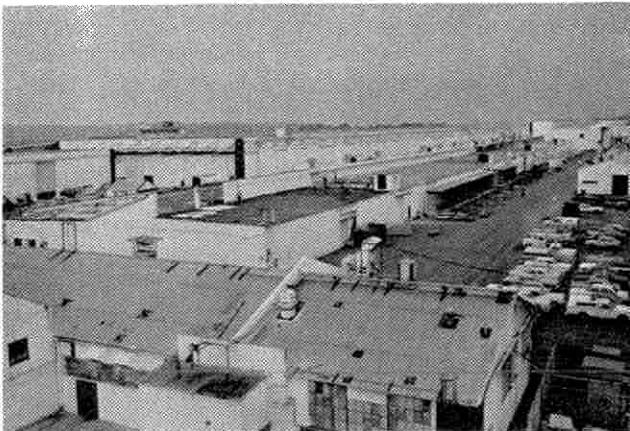
NMACC Night at Fiesta Dinner Theater

"They're Playing Our Song" by Neil Simon and music by Marvin Hamlisch is featured at the Fiesta Dinner Theater on Thursday, March 3. Tickets are \$16 per person. The price includes buffet dinner and show, with seating in the center section. Dinner starts at 6:30 p.m., and the play at 8:15 p.m. Ticket cutoff is February 15. For ticket reservations, call Dottie Brugger at LF 8327.

Reminders

Postage Stamp Machine Move. Today, the U.S. postage stamp machine will be relocated from building 4 mail room to building 4, col A-24, graphics area.

Area Code Change. As of February 5, Pacific Telephone will no longer provide transparent dialing for 619/714 area codes. If you dial the incorrect area code, you will reach a recording.



Demolition of old buildings in May 1982 looking north from building 5 water tower.

Lindbergh Field Reconstruction

The construction at Lindbergh Field started last June is nearing completion. Already completed are the building 75 expansion and building 4 new mezzanines and loading dock. Completion of building 1 expansion is targeted for the end of February. This effort has been accomplished under budget and on or ahead of schedule. Relocation of machines will begin on March 1 as planned. Over 150 machines have been relocated to their permanent locations in either building 1 or 5. Additionally, new high-bay storage and material handling systems have been installed in building 4. Raw material consolidation is well under way and will be complete within the next several weeks.

This very successful program is the result of much hard work and team effort on the part of all Lindbergh Field personnel.

'Convairsations with Management' Series

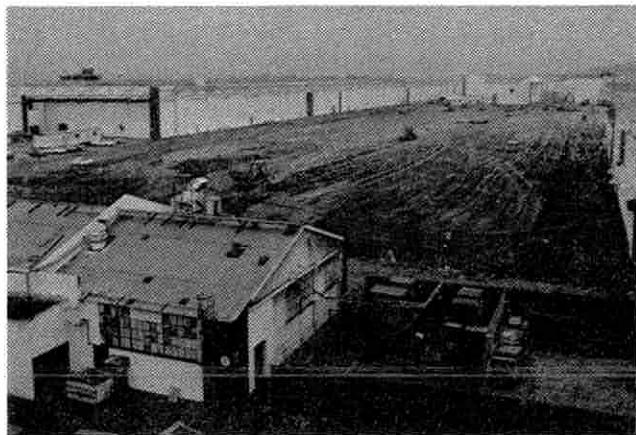
Session IV of 'Convairsations' will be presented by George Roos of Integrated Logistic Support on February 8. Augie Daddi, originally announced for this meeting, will be rescheduled at a later date. Dan Da Pra of Research and Engineering will conduct Session V on February 15.

Meetings are held in the Kearny Mesa building 2 presentation room from 4:30 to 6:30 p.m. They are free and open to all employees. Take this opportunity to meet division staff members and exchange ideas. Please call Kathy Milhaud at KM 1803 for reservations.

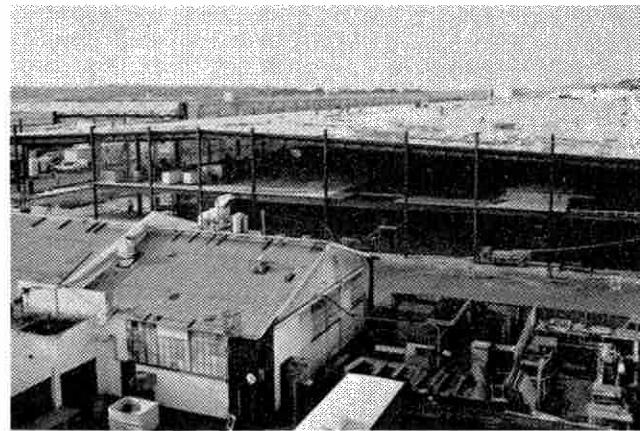
Car Rental Source Change

Effective February 1, Ladki International Rent-A-Car will be Convair's prime source for short-term car rentals in the Los Angeles and San Diego areas. Airport pick-ups and delivery will be provided during normal operating hours, and after-hours services can be arranged by contacting Ladki's Laurel Street office one day in advance. You can reach Ladki between 8:00 a.m. and 6:00 p.m. at 233-9333. Budget Rent-A-Car is the backup rental source, and can be reached at 268-3444 between 7:00 a.m. and 10:00 p.m. weekdays, and 9:00 a.m. and 6:00 p.m. on weekends.

Note: As PHd no longer has a contract to furnish Convair vehicles, all individuals currently renting cars from PHd should return their car to PHd immediately and obtain a car from Ladki or Budget.



Same location, showing area cleared of old buildings (July 1982).



New building 1 addition being roofed (December 1982).

Stop Smoking

Take charge of your smoking! Making a new life that excludes cigarettes is no easy task. It takes considerable time, incentive, and practice. The Health-Fitness Center is offering a stop smoking program that can help you achieve a new lifestyle without cigarettes. The class begins February 7 at 4:45 p.m. in Room B in the CRA clubhouse. Fees are \$40 for nonmembers and \$37 for HFC members.

New Graduate Shape-Up Program

The Shape-Up graduate program begins February 7, east of the pavilion in Missile Park. All Shape-Up participants who have completed the initial seven-week program are eligible for the graduate program. Class meets Mondays, Wednesdays, and Fridays at 4:30 p.m. (Note: The Early Bird program has been cancelled.) Check with the HFC for registration. Annual membership is \$80, \$35 additional for spouse.

Noon Movie: 'Ski Mountains West'

This week's movie is produced by United Airlines. At Kearny Mesa, showings will be at 11 a.m. and noon on Wednesday in classroom 3 of building 17. At Lindbergh Field, showings will be on Thursday in the building 5 auditorium at 11 a.m., noon, and 7:30 p.m.

Employment

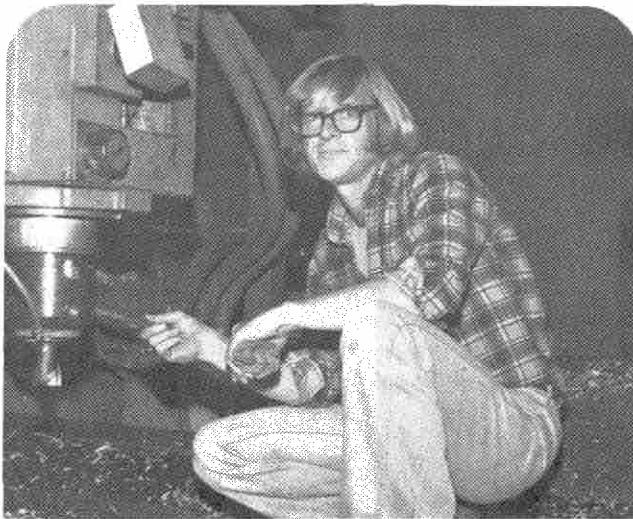
For the week ending January 28, employment was 9,628.

CONVAIR

Weekly Log

February 14, 1983

Published by the Convair Division of General Dynamics



KEN JEWELL
Dept. 0-15
NC Machinist
Plant 19
4 Years at Convair

"Quality is perfection. In my opinion, if a part is perfect, quality has been achieved. 'Nothing Short of Right is Right' means precision and perfection, with no margin for error."

Nothing Short of Right Is Right!

'Tomahawk YES' Presentation Available



Norm Keith, a 27-year Convair employee, has been selected to administer the division's vendor awareness program and the "Tomahawk YES" motivational presentation highlighted in last week's quality awareness column.

"Tomahawk YES" incorporates the latest cruise missile film "No Shortcut to Perfection." The entire presentation is targeted toward suppliers and in-plant employees who support the cruise missile program.

The presentation has already been enthusiastically received by over 600 Convair employees and is available to all departments upon request. If you are interested in finding out more about scheduling this presentation in your area, call Motivational Programs, KM 2256.

Fuselage Delivered to Douglas Aircraft Co.
Fuselage 396 for KC-10 No. 18 was delivered to Douglas Aircraft Co. in Long Beach on Tuesday, February 1.



Displaying the award for Convair is W.F. Rector, III, vice president and program director of Space Programs (left) and Lloyd Munson, Shuttle Mid-fuselage program manager (right).

NASA Presents Award to Convair

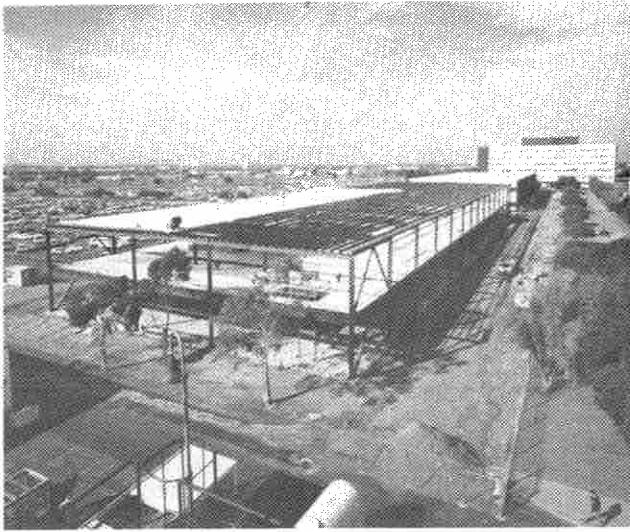
A miniature American flag and a mission emblem patch carried aboard the space shuttle *Columbia*'s maiden flight on April 12-14, 1981 were presented to Convair by NASA Headquarters for our contribution to the exceptional success of that mission. The items were accompanied by a certificate signed by astronauts John Young and Robert Crippen.

Convair built the *Columbia*'s mid-fuselage and those for both the shuttle orbiter *Challenger* scheduled to fly in March 1983 and the original test article *Enterprise*. The mid-fuselage for the third flight orbiter, *Discovery*, was delivered in March 1982, and the fourth article, *Atlantis*, will be delivered in May of this year. We expect an order for a fifth flight orbiter this year.

Convair will continue to be a key member of the shuttle team with the development of the Centaur as a shuttle upper stage, scheduled to begin flights in 1986 for the Galileo and International Solar Polar planetary missions. The Centaur is expected to be a primary upper stage for the NASA shuttle system for years to come.

Make Stock and Savings Changes Now

February is the month for you to make changes in your stock and savings plan or enroll if you now have one year of service. These changes will become effective as of the first full paycheck in April. If you have one year of service with General Dynamics and have not been contacted by Employee Benefits, call KM 2559 to clarify your eligibility. This is especially important if you were hired during the last several months and have previous General Dynamics service. Detailed plan information, and enrollment and change forms are available at Employee Benefits.



KM building 25, looking north toward building 1.

Kearny Mesa Plant Expansion Update

The August 16, 1982 Weekly Log reported the start of the expansion program. Now six months into the program, everything is progressing as planned and on schedule. The courtyard enclosure, building 4, westside, was completed on schedule and the ground electronics development laboratory is fully operational in this new area. In addition to the construction of building 25, construction will soon be starting on 80,000 square feet of mezzanine in building 5, adjacent to the existing mezzanine. Construction and office areas should be complete by Labor Day, with personnel permanently relocated.

Going unnoticed by most employees is the construction in the east yard on the liquid material storage facility. In addition to barrel and high-pressure vessel storage, sensitive materials requiring environmentally controlled storage will be housed in this facility. This facility is designed to meet current standards for handling and storing the type of materials used at Convair.

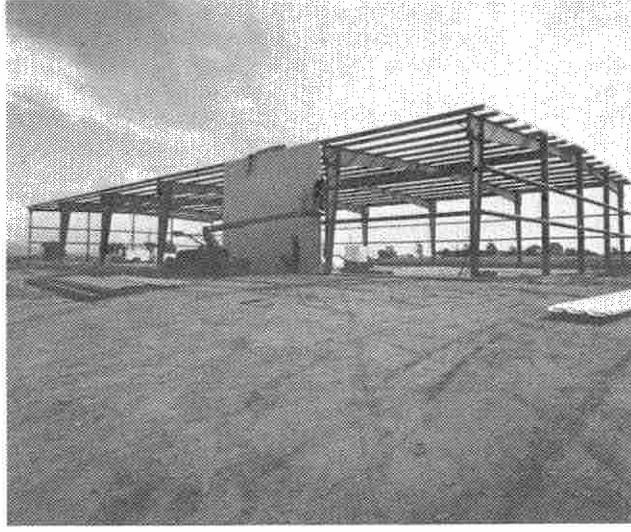
NMACC 'Convairsations with Management'

Dan Da Pra, vice president of Research & Engineering, will conduct the February 15 session of "Convairsations with Management." There will be no February 22 meeting. Augie Daddi's discussion on Industrial Relations has been rescheduled for March 1.

"Convairsations" is an excellent way to meet our top management, learn how each function of the division operates, and exchange ideas. Meetings are held in the Kearny Mesa building 2 presentation room from 4:30 to 6:30 p.m. They are free and open to all employees. Please call Kathy Milhaud or John Doggett at KM 1803 for reservations.

Noon Movie: The Fifth Flight of the Space Shuttle

This week's movie was produced by NASA. Kearny Mesa showings will be at 11 a.m. and noon on Wednesday, in classroom 3 of building 17. Lindbergh Field showings will be on Thursday in the building 5 auditorium at 11 a.m., noon, and 7:30 p.m.



Building 45, Liquid Material Storage Facility, looking eastward.

Pre-Retirement Seminar to Meet

A few openings still remain in the Pre-Retirement Planning Seminar scheduled to begin on February 22, for six consecutive Tuesday evenings. Sponsored by the Employee Benefits and Educational Services departments, and conducted by Central Federal Savings, the sessions are held from 5:30 to 7:30 p.m. Reservations are necessary and can be made by calling KM 2267. Spouses are encouraged to attend. Participants should meet in the lobby of building 2 on the first night. Employees must wear their badges.

NMA Convair Chapter Current Offerings

Night at Fiesta Dinner Theater. "They're Playing Our Song" by Neil Simon with music by Marvin Hamlisch is featured at the Fiesta Dinner Theatre on Thursday, March 3. Tickets are \$16.00 per person. The price includes buffet dinner and show, with seating in the center section. Dinner starts at 6:30 p.m., and the play at 8:15 p.m. Ticket cutoff is February 15. For ticket reservations, call Dottie Brugger at LF 8327.

From The Health-Fitness Center

- Free headache presentation, March 8 at 5:00 p.m. Health-Fitness Center Room A.
- Next fun run, February 22 at 4:30 p.m. in Missile Park.
- Un-Diet weight loss — contact the Health-Fitness Center for class dates and times.

For more information read the CRA Newsletter or call the Health-Fitness Center, KM 3567.

Employment

For the week ending February 4, employment was 9,645.

CONVAIR Weekly Log

February 21, 1983

Published by the Convair Division of General Dynamics

Quality Awareness



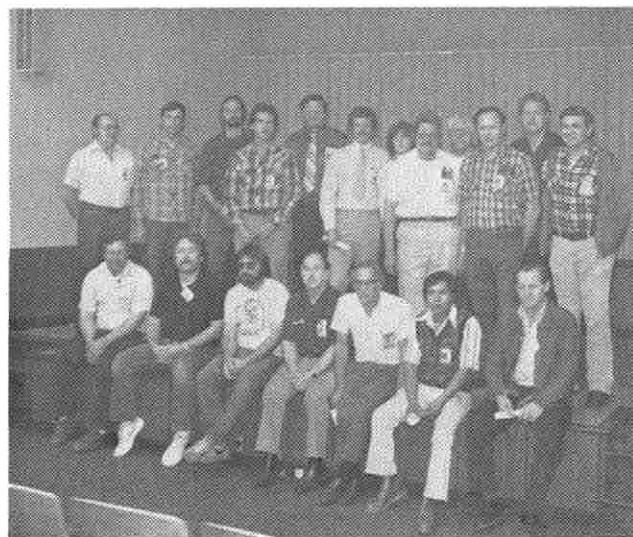
EXCEL award recipients for the RGS video training program receive congratulations from their supervisors. Pictured left to right are Robert Montague, Sam Long, Bill Stevens, Anna Clark, Chuck Bohle and Andy Frank. Not shown are Bruce Marshall, who coordinated the program for Industrial Relations, and EXCEL recipient Jim Cleghorn.

Training Videotape Completed

Congratulations are in order for those who recently completed Convair's first video training program. The videotape, entitled "Convair's Requirement Generation System," is currently being used in conjunction with several training and orientation programs in Operations, Engineering, and Finance. Development of this program represents more than a year's effort and sets a new industry standard for video programs of this type.

Technical Assistance Team Established

Department 015-0, Machine Shop, has selected 15 top machinists to form a group called the Technical Assistance Team (TAT). The team leader is George Archbold. The TAT function will be to assist all of the different cost centers in improving the quality of our products. One specific function of the TAT is to check machined parts during the machining cycle. This process will help ensure quality in machined parts before inspection.



Members of TAT from Dept 015-0, Machine Shop.

Making a Difference

NMACC 'Convairsations with Management'

There will be no "Convairsations" session this week. However, next week, on March 1, join Augie Daddi for his discussion on Industrial Relations. The meeting will be in the Kearny Mesa building 2 presentation room from 4:30 to 6:30 p.m. It is free and open to all employees. Call Kathy Milhaud at KM 1803 for reservations.

Final Notice for GD Night at Disneyland — February 26

Tickets for the special party at Disneyland will remain on sale through Friday, February 26. However, today is the last day to obtain bus tickets to the event. Call Jody now at LF 8142 for information and tickets.

From CRA

San Diego Sockers. Tickets are now on sale for Wednesday, March 9, at 7 p.m., when the Sockers meet the Cleveland Force. CRA has excellent seats for only \$7 (regularly \$8).

Knott's Berry Farm. CRA now has tickets for Knott's Berry Farm fun days on Saturday, March 19, and Sunday, March 20. General admission tickets are \$7.25 and include unlimited use of all park attractions.

Pacific Indoor Rodeo. Tickets are on sale at CRA for Saturday, February 26, at 8 p.m., and Sunday, February 27, at 2 p.m. at the Sports Arena. Adult tickets are regularly \$8, but through CRA, they're only \$6. Tickets for children 12 and under are \$4.

NMA Convair Chapter Courses

Interpersonal Relations. This course is designed to help you better understand your role as part of a management team. The eight-week class begins Monday, February 28, and will be held from 4:30 to 6:30 p.m. in KM building 26, second floor, column J-17, in the Think Tank conference room. The cost is \$5 for NMACC members and \$15 for nonmembers. Enrollment is limited to 20. The facilitator will be George Brown. Register with Chris Yates at KM 3096 or Jim Denzien at KM 3108.

Andlinger Business Game. This is a self-administered, noncomputer business game that can help participants appreciate and better understand the impact of top-level decisions in an organization. The four-week class is scheduled for Tuesdays and Thursdays, starting March 1, and will be held from 11:30 a.m. to 12:30 p.m. at Lindbergh Field, building 5, second floor, column T-13, in the Finance conference room B. The cost is \$5 for NMACC members and \$15 for nonmembers. Enrollment is limited to 20. The facilitator will be Connie Bursher. Register with Chris Yates at KM 3096 or Jim Denzien at KM 3108.

CPR Certification Class

Registration is now open for a two-part certification course for cardiopulmonary resuscitation, both for recertification as well as initial training. The in-plant sessions will be held in the KM cafeteria on March 14 and 16, from 5:00 until 9:00 p.m. Refreshments will be provided by the NMACC sponsors. Reservations should be made via the 24-hour number at the KM Fire Station: KM 1811. Instructor Jack Boucher encourages employees and their families and friends to participate. Please call now as the class is limited to 25 participants.

Please return your spare copies of the current in-plant telephone directory to Division Distribution, MZ 40-2514.

They Retire in February

Thanks and best wishes to each of these Convair employees retiring in February 1983. So many employees are retiring this month that we are only printing half the list (the rest will appear next week).

Name	Department	Years of Service
Harold D. Adamson	015-0 Machinist	32
Gregorio Angoco	002-0 Process tank loader	18
Fredrick D. Applegate	640-0 Chief program engineering	43
George L. Austin	684-0 Sr config mgmt analyst	30½
John S. Bergstrom	646-0 Senior project engineer	42
Roger R. Brown	043-0 Aircraft assembler – S+S	25
Eugene Catton, Jr.	472-0 Manufacturing engineer	41
Frank S. Chambers, Jr.	110-1 Contracts manager	32
John H. Fountain	553-8 Senior software engineer	27½
Robert A. Gadow	231-0 Mfg control specialist	29½
Eldon R. Garretson	809-2 Manufacturing dispatcher	26½
James K. Gaston	542-3 Computer operator	34
Willis H. Goldsmith	102-4 Senior graphic designer	30
George R. Gray	359-0 Precision parts inspector	41½
Frederick W. Hartson	550-2 Senior software engineer	16½
Sam E. Hutchinson	002-0 Painter production A	24½
Howard M. Ikerd	647-0 Senior project engineer	28
Jerry Janda	191-0 Accounting specialist	30
Lee E. Johnson	363-0 Eng standards dev tech	30

Reduced Loan Rates at Point Loma Credit Union

Point Loma Federal Credit Union announces new, low rates on several classes of loans, including:

Unsecured	15% APR	Up to 4 years
New Cars	13% APR	Up to 5 years
Used Cars	14.5% APR	Up to 4 years

The main office on Sports Arena Boulevard is open Monday through Thursday until 4:30 p.m., Fridays until 5:30 p.m., and Saturdays from 9:00 a.m. to 1:00 p.m. Stop by, or call 226-1600, if you would like a loan application mailed to you.



Congratulations to the 16 General Dynamics employees who have been selected as volunteer staff to the CRA Health-Fitness Center. These employees successfully completed a four-week, intensive health-fitness training program. Their function will be to assist the HFC in conducting its Shape-Up programs.



HEALTH FITNESS CENTER

GENERAL DYNAMICS • CONVAIR RECREATION ASSOCIATION

Health-Fitness Center News

Fitness Profiles. Thursday, February 24. Contact the Health-Fitness Center, KM 3567 for an appointment.

Fun Run Club. Next run is Tuesday, February 22, at 4:30 p.m. at Missile Park

Headache Clinic. Free lecture, Tuesday, March 8, at 5:00 p.m. in CRA Clubhouse Room A.

Un-Diet. If you are interested in a motivating weight-loss class, contact the HFC for more information.

For more information read the *CRA Newsletter*, or call the Health-Fitness Center at KM 3567.

Noon Movie: 'Boating Safety'

This week's movie is produced by the U.S. Coast Guard. At Kearny Mesa, the showing will be at noon on Wednesday in classroom 3 of building 17. At Lindbergh Field, showings will be on Thursday in the building 5 auditorium at 11 a.m., noon, and 7:30 p.m. A volunteer projectionist is needed to resume the 11 a.m. showing at KM. Call Bob Gobrecht, KM 1525 if you are interested.

Employment

For the week ending February 11, employment was 9,644.

CONVAIR Weekly Log

February 28, 1983

Published by the Convair Division of General Dynamics



DON SHEPARD
Group Leader
Processing Area
Kearny Mesa Plant
13 Years at Convair

"Quality is each individual taking pride in his work, the kind of pride that makes you want to solve problems rather than create them. 'Nothing Short of Right is Right' means making a determined effort to get it right the first time and correcting any mistakes you may have made."

Nothing Short of Right Is Right!



Response to the 1983 employee referral program that started on January 31 has been enthusiastic. To date, over 250 cards have been received by Professional Staffing, and applications are currently being processed to get referrals on board.

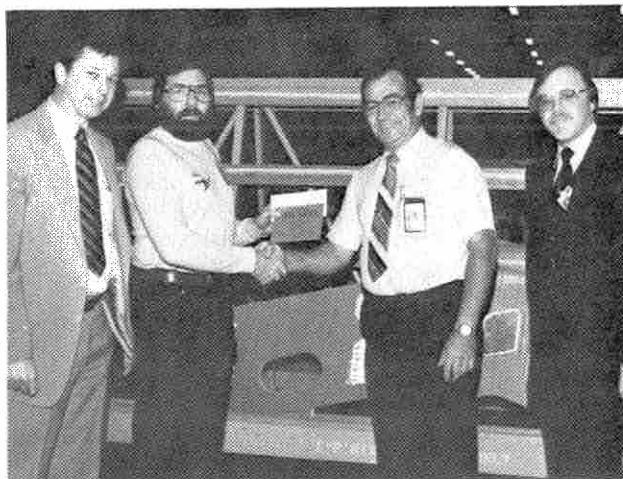
1982 Award Winners — R.F. (Rick) Bausback (633-0) has already ordered a new microwave oven. G.M. (Jerry) Huston (953-0) has selected a five-piece wrought-iron patio furniture set. D.W. (Dan) Healy (664-0) prefers to lounge indoors on his plush Barcalounger recliner. R.H. (Dick) Taddiken (111-0) will soon have a Hooker gun cabinet to show off his collection.

These are only a few examples of the merchandise available to you should your GTS referral be hired and satisfactorily complete 90 days of employment.

You, too, can be a winner by submitting your engineer/scientist referrals. See the program brochure, the cardboard backing of your GTS notepad, or drop by Professional Staffing (east end of bldg 1, 1st floor, KM) for details. Cards can be found in the major vending locations and entrances to the plants. Call David Ibarra (KM 6331) for more information.

Employee Suggestion Pays Off for 767

Thanks to an innovative employee suggestion by John Halyburton, the cost to manufacture 767 strut side skins has been significantly reduced. In addition, manufacturing flow time was cut in half and part quality measurably improved. All this came about from John's recognition of the full potential of the Marwin routers he operates at Plant 19, which he felt could do the job of four prior operations, including a very costly chem-etch operation. He was right. This suggestion will save the 767 program over \$800,000 and earned him a \$7,800 award. Our thanks and congratulations to Mr. Halyburton. It's ideas like his that boost productivity and help keep Convair competitive.



A.J. (John) Halyburton (second from left), Dept. 015, receives an Employee Suggestion Award and check from his supervisor, Jim Faulkner, as D.R. Dunbar, 767 Program Director (left), and D.L. Weelborg, Dept. 015 general supervisor (right), extend congratulations.

GLCM Tomahawk Makes Successful Flight

The Ground Launched Cruise Missile program successfully completed another flight test when BGM-109G missile T72:3 was launched February 23 at the Utah Test and Training Range.

After launch and transition to cruise flight, the vehicle conducted a mission of one hour and 54 minutes, which included terrain following and guidance performance evaluation; closed-loop, time-of-arrival tests; warhead arming and interface tests; target overflight; and successful recovery.

Flip

They Retired in January

Thanks and best wishes to each of these Convair employees who retired in January 1983.

Name	Department	Years of Service
Arthur B. Jolly, Jr.	985-1 Group leader	21½
Robert G. Jones	673-0 Engineering specialist	25½
Nickolaos S. Kourbelas	603-0 Engineering specialist	32
Margaret A. Kovar	526-1 Data design	4½
Glenn D. Lindeneau	603-0 Engineering specialist	37
John K. McDonough	015-0 Bore machine operator	41
Charlotte McLaughlin	646-0 Executive secretary	33
Laura E. Mitchell	042-0 Assembler	22
Eddie Monroig	015-0 Honed surfaces mechanic	15
William M. Moseman	431-0 Sr tool oper planner	17
Billy J. Napier	111-0 Estimating specialist	31
Virginia L. Petersen	543-4 Data systems	29
John F. Pullo, Jr.	670-0 (GDSC) space engineering	2/3
Daniel J. Rogers	342-0 Process inspector	25
Elwood B. Ruttan	675-0 Design drafter	36
Joseph S. Scalisi	233-0 Manufacturing dispatcher	29
Earnest D. Shattuck	268-0 Logistics specialist	30
Herman R. Short	759-0 Group leader	35
Foy E. Slayton	015-0 Operations representative	40
Elsie E. Speck	117-0 Staff secretary	25
James C. Sroat	656-0 Senior design engineer	39
Maston E. Thomas, Jr.	341-0 Quality control engineer	41
Clifford L. Thompson	019-0 Mfg operations spvr	42
Earl M. Van Huss	985-4 Inspector	39
Desmond H. Vaughan	673-0 Engineering specialist	25
Carl L. Walden	461-0 Mfg engineer analyst	39
William R. Walker	019-0 Mfg operations gen spvr	32
James M. Wallace	350-0 Inspector – msl final assy	35
Harry T. Weaver	015-0 Jig borer – machinist	13
Frederick D. Winston	604-0 Senior engineer	30
Bill Worsham	675-0 Design drafter	31
George H. Yamada	523-2 Sr programmer analyst	23



Front: F. Bordenkircher, John Fuller, Therese Murto, M. McCaskey, and Ted Meyers. Rear: Louie Johnson, Matt Emery, Barry Knupp, Robert Bennett, Ray Taylor, Gary McCrary, and Lloyd Munson.

OMF Assembly Personnel Complete Training

Ten lucky Convair employees in Dept. 39 completed their Orbiter Mid-Fuselage (OMF) training program by spending one day at the Space Shuttle Assembly Plant in Palmdale, California. According to Don Evanson, OMF training coordinator, one inspector and three people from each class were selected based on results of a final written test and class participation.

The OMF Training Program involves employees in the decision-making process and exposes them to how other departments "service them." This type of training has resulted in reduced factory assembly discrepancies and fewer manhours spent on the OV-104 vehicle.

NMACC 'Convairsations with Management'

This Tuesday, March 1, Augie Daddi will discuss Industrial Relations. This very popular session had to be rescheduled from an earlier date. On March 8, Dr. Terry Straeter, director of DSD Western Center, will talk about the computer services that affect all of us.

There will be no meeting on March 15, but on March 22, Art Veitch, the new vice president of Contracts and Estimating, will speak. Don't miss any of these interesting and informative get-togethers. They are held Tuesday afternoons from 4:30 to 6:30 p.m. in the Kearny Mesa building 2 presentation room. Call Kathy Milhaud, KM 1803, for reservations. The program is open to all employees at no charge.

CPR Certification Class

Registration is now open for a two-part certification course for cardiopulmonary resuscitation, both for recertification as well as initial training. The in-plant sessions will be held in the KM cafeteria on March 14 and 16, from 5:00 until 9:00 p.m. Refreshments will be provided by the NMACC sponsors. Reservations should be made via the 24-hour number at the KM Fire Station: KM 1811. Instructor Jack Boucher encourages employees and their families and friends to participate. Please call now as the class is limited to 25 participants.

Toastmasters Sponsor Speechcraft Course

On Monday, March 7, an eight-week public speaking course is scheduled to begin. The class will be held at Mr. "G's" Restaurant at Clairemont Mesa Blvd and Ruffin Road. The cost of the class is \$25. For more information, call Cheryl Defendorf at 271-1539 or Tom Titchenor at 563-0795.

CRA News

Mr. Al Pentis, internationally known authority on the life and behavior of the California Gray Whale and wildlife of the Coronado Islands, will present a free program including slides and specimens on Wednesday, March 9, at 7:30 p.m. in the CRA auditorium.

CRA Travel will sponsor a cruise aboard the 95-foot New Seaforth on Saturday, March 12, and Mr. Pentis will accompany the group (limited to the first 70) on the 8-hour trip to observe the northward migration of these very intelligent creatures. Cost of the cruise is \$17 per person, and you can make reservations through CRA Travel, 278-1177 or KM 2898.

Noon Movie: 'What Went Wrong Skipper?'

This week's movie is produced by the U.S. Coast Guard and stars Robert Wagner and Charles Nelson Riley. At Kearny Mesa, the showing will be at noon on Wednesday in classroom 3 of building 17. At Lindbergh Field, showings will be on Thursday in the building 5 auditorium at 11 a.m., noon, and 7:30 p.m. A volunteer projectionist is needed to resume the 11 a.m. showing at KM. Call Bob Gobrecht, KM 1525 if you are interested.

Employment

For the week ending February 18, employment was 9,619.

CONVAIR **Weekly Log** March 14, 1983

Published by the Convair Division of General Dynamics



CINDY HUDDOCK
Secretary
Atlas/Centaur Final Assembly
Kearny Mesa Plant
4 years at Convair

"Quality means perfection. 'Nothing Short of Right is Right' means doing the best quality work I can."

Nothing Short of Right Is Right!

Patent Awarded to Convair Employees

A U.S. Patent was recently issued to Gene Woods (Dept 607) and Don Magnuson (Dept 676). Their patent arose out of their work in energy systems and involves a device for detecting "normal" (or higher resistivity) zones in superconducting magnets.

USS New Jersey Visit

The battleship *New Jersey* will dock in San Diego on April 1, and 8,000 civilians are invited aboard. Recommissioned by President Reagan, the *New Jersey* is fitted with 1,500 mile-range Tomahawk cruise missiles, Harpoon antiship missiles, Phalanx antimissile batteries, and extended-range projectiles for her nine 16-inch guns. The Navy will issue tickets for tours of the battleship scheduled for Saturday, April 2, and Sunday, April 3, and requests that all applications contain self-addressed, return envelopes and be postmarked no later than March 15. Requests should be sent to: Public Affairs Office, Commander Surface Force, U.S. Pacific Fleet, Code 021, San Diego, CA 92155.

Savings and Stock Plan Values for January

	1980	1981	1982
Salaried			
Government Bonds	\$ 2.5154	\$ 2.8106	\$ 3.3840
Diversified Portfolio	2.0544	2.0370	2.6402
Fixed Income	1.1653	1.2953	1.4459
Hourly			
Government Bonds	2.5127	2.8075	3.3817
Diversified Portfolio	2.0992	2.0801	2.6948
GD Stock	\$34.3750	\$26.0000	\$38.0000

NMACC March Membership Meeting

This month's meeting is sponsored by the Finance Department and features Louis Tice, the originator of "New Age Thinking." New Age Thinking (NAT) is a program of simple, workable concepts that help individuals make the most of their potential for success at work and fulfillment in their personal lives. Tickets for the Wednesday, March 16, meeting at the Sheraton Harbor Island in the Champagne Ballroom can be purchased at all NMACC Booster outlets. Tickets are \$7.50 each for members and spouses, and \$13.50 each for nonmembers. The program begins at 6:00 p.m. (following the social hour), and dinner will be served from 7:30 to 8:30 p.m. The Scholarship Fund drawing will follow.

NMA Current Offerings

La Paz Trip. A five-day, four-night trip to La Paz is planned for May 25 to 29. The \$150 per person price includes bus transportation to and from Tijuana airport, round-trip air fare, accommodations, and buffet dinner. Optional fishing trips will also be arranged. A \$50 reservation is required by April 22, and final payment by May 2. Contact Bill Kramer, KM 2855, for information and reservations.

"Learn to Cope with Stress." This one-session seminar will be presented by Harvey Silverston, director of Stress Reduction Training Programs at UCSD, on March 8 from 4:45 to 6:00 p.m. at Kearny Mesa, building 5, mockup conference room A. Open to all Convair employees, the fee is \$2.00; to register, mail check payable to NMACC to Sue Fontaine, MZ P2-2700.

"How To Get Along With Your Back." This presentation, open to all Convair employees, will be conducted by Dr. Larry Adams on March 15 from 4:45 to 6:15 p.m. at Kearny Mesa, building 26, space conference room. Fee for the class is \$2.00. Mail check payable to NMACC to Sue Fontaine, MZ P2-2700.

Fuselage Delivered to Douglas Aircraft Co.

Fuselage 397 for KC-10 No. 19 was delivered on schedule to Douglas Aircraft Co. in Long Beach on Tuesday, March 8.



No Shortcut to Perfection!

"Tomahawk Yes" Presentation Available

Over 1,400 employees have viewed this Convair-produced film and the chart presentation about the Tomahawk program. If your group or department would like to see this thirty-minute program about cruise missile assembly and supporting tasks, contact Motivational Programs at KM 2256 to schedule your presentation.

Las Vegas Weekend

A weekend in Las Vegas is planned for June 3 through June 5 at the El Rancho Hotel and Casino (formerly the Silverbird, located on the strip across the street from Circus Circus). The cost is \$80 per person (double occupancy) and includes two nights' lodging, fun books, and sandwiches and mixes on the bus. Contact Don Early; LF 8656, Yolanda, KM 1476 or 1489; or Dottie, LF 8492, to make your reservations as soon as possible.

AIAA Sponsors Lecture Series on Robotics

A series of five lectures on different aspects of the field of robotics is being sponsored by the San Diego section of the American Institute of Aeronautics and Astronautics. The topics range from factory automation to spacecraft robotics, along with a special session about advancements in the field of robots for people (e.g., prosthetics/bionics). The speakers are all nationally or internationally recognized experts in their subjects. The series will be conducted in the Kearny Mesa building 2 presentation room from 6:30 to 9:30 p.m. Session dates will be March 15, 22, 29, and April 5. A tour of a local robot assembly facility is scheduled for March 19. Cost for the series is \$20 for AIAA members and \$40 for nonmembers. For reservations or information, contact Mike Burz at LF 8935. Seating is limited, so call early.

Toastmasters No. 457 Sponsor Speechcraft Course

On Thursday, April 7, an eight-week course in public speaking will begin. Classes will be held at the CRA Clubhouse in room C from 5:00 to 7:00 p.m. The cost is \$10. For more information, call Don Bain at KM 3460, Herb Bickley at KM 6424, or Bill Gallagher at KM 2914.

From the CRA

CRA Discounts

Knotts Berry Farm Fun Days will be Saturday, March 19, and Sunday, March 20. Enjoy admission and unlimited use of all park attractions for only \$7.25 (regularly \$9.95). Get your tickets now at CRA.

S.D. Clippers vs. L.A. Lakers. CRA has tickets for this game on Saturday, March 19, at 7:30 p.m. at the Sports Arena. See Terry Cummings, Tom Chambers, and Bill Walton as they take on the world champion Lakers featuring Kareem Abdul-Jabbar, Magic Johnson, and Jamaal Wilkes. Terrace-level seats are \$7 and \$5 (regularly \$9 and \$7).

Yugoslavian Hams. CRA will be selling 11-pound hams for \$27.50 beginning Wednesday, March 16, for the Easter holidays. Stop by the CRA sales office and pick up one of these delicious hams.



HEALTH FITNESS CENTER

GENERAL DYNAMICS • CONVAIR RECREATION ASSOCIATION

From the Health-Fitness Center

Back In Action. A five-hour concentrated program to help you avoid back pain and injury. Class begins Tuesday, March 22, at 4:45 p.m.

High Stress Coping Skills. Learn professional skills of stress management. Class begins Tuesday, March 15, at 4:45 p.m.

For more information, read the *CRA Newsletter* or call the Health-Fitness Center, KM 3567.

Noon Movie: 'Century Crystallized'

This week's movie will be shown only at Kearny Mesa and only once. The showing will be at noon on Wednesday in classroom 3 of building 17.

Employment

For the week ending March 3, employment was 9,590.

CONVAIR Weekly Log

March 28, 1983

Published by the Convair Division of General Dynamics

Quality Awareness

QIP Measures Quality at Convair

Have you noticed the Quality Improvement Program displays at various locations around Convair? If you take a closer look, you will see a series of charts that track such quality performance indicators as scrap, rework, yield, percent of purchased lots accepted, deviations/waivers, inspection escapes, and overtime.

QIP began as a response from the aerospace divisions to a challenge issued by Gen. Robert Marsh, Commander, Air Force Systems Command, in May 1982. At a conference hosted by AFSC, Gen. Marsh outlined a quality improvement program to be instituted throughout his command. He also challenged Air Force contractors to implement formal QIPs based on current quality levels that would establish goals, measure achievements, and report results. The program has grown to include all General Dynamics divisions that produce military products.

The measurement of quality indicators represented by the charts on display is only one part of the program. QIP also involves extensive training, goal-setting, and involvement by top management. Ultimately, it will enable Convair to produce higher quality products at the lowest user cost.

The charts are produced by a Tel-A-Graf software package on a computer plotter and will be updated monthly. Watch the *Weekly Log* for progress reports.

Making a Difference

Update: Kearny Mesa Plant Office Rearrangements

Four major office facility projects are in progress at the Kearny Mesa Plant. The KM building 5 mezzanine addition, the colocation of support personnel for the Cruise Missile and Space programs, refurbishment of building 3 floors 2 and 3, and the construction of a Research & Engineering facility (building 25).

Mezzanine Addition. On March 14, construction of an addition to the mezzanine in KM building 5 was started. This new mezzanine will be 33,900 square feet, and when completed, 67,800 square feet of office area will be available for the colocation of Cruise Missile support personnel. This staff move will increase efficiency by eliminating communication barriers between functional groups that support the project. During the construc-



Extraordinary Achievement Award

Bob Boriss, chief of Navigation Technology, recently received an Extraordinary Achievement award for leading a highly successful and timely program to build and flight test an advanced navigation system. Pictured above with Bob are: Dan Da Pra, vice president, Research & Engineering; George Mavko, manager, Sensor & Signature Technology; and Ron Hubbard, director, Advanced Technology Development.

Employee Stores Sale on April 2

The employee stores sale will be held on Saturday, April 2, at the Washington Street (Gate 23) entrance of the LF salvage yard from 8:00 a.m. to noon. Employees may bring one guest. No pets, no children under 15, and no open-toed shoes are allowed. Desks, chairs, work benches, tables, scrap metal, and wood will be available. Convair employees may pay for their purchases by check; all other transactions will be on a cash basis only. For more information, call LF 8609.

tion period, the aisle between columns F-5 to H-5 and the restroom at H-5 will be closed to all personnel because of the work being done overhead. The new office areas will be available for occupancy by August 1. **Staff Relocation.** Personnel supporting the Atlas, Atlas/Centaur and Shuttle/Centaur space programs will be colocated in KM building 26. The relocation and rearrangement of over 850 people is required to accomplish the colocation of space programs. The rearrangements will begin around April 8.

KM Building 3. Floors 2 and 3 of building 3 are presently being refurbished and are scheduled for occupancy on April 15. These areas will be improved with new ceilings, lighting, partitions, and carpeting.

R&D Facility. The construction of the Research & Engineering facility, KM building 25, is on schedule. Occupancy for approximately 800 engineers will be available by approximately August 1.



Donna Clark addresses area high school students.

Convair Reaches Out to Area High School Students

Convair is participating in the Project Aware program sponsored by Grossmont Union High School District, which is directed toward making students aware of the tremendous changes taking place in our society and of the need for technological skills to compete in tomorrow's workplace.

On March 22 and 23, representatives of local firms addressed the students, emphasizing that companies will continue to require employees with technological skills and encouraging students to take advantage of available mathematics and science courses. Convair's speaker was Donna Clark, a mechanical test engineer in Space Marketing. Another Convair employee, Elizabeth Hayes, a systems engineer working on advanced space projects, participated in a Career Day at Monte Vista High School on March 17.

NMACC 'Convairsations with Management'

Due to program reviews, the "Convairsation" for this Tuesday, March 29, had to be cancelled. Dave Archibald of Quality Assurance will be rescheduled for a later date. On April 5, Dr. Ray Beuligmann will discuss Energy Systems, and on April 12, the Space and 767 Strut programs will be addressed by Bill Rector and Dennis Dunbar. Take this opportunity to find out the latest developments in these important and exciting product lines.

The program is free, and it is not necessary to have attended earlier sessions. Meetings are on Tuesdays from 4:30 to 6:30 p.m. in the Kearny Mesa building 2 presentation room, unless otherwise announced. For reservations, call Kathy Milhaud at KM 1803.

From the Health-Fitness Center

Shape Up. The next Shape Up program begins April 4, at 4:30 p.m., for 7 weeks. Preregister with the HFC.

Lindbergh Field Shape Up also begins on April 4, at 4:30 p.m., and requires preregistration at the HFC.

Fun Run Club. The next fun run will be on Tuesday, March 29, at 4:30 p.m. in Missile Park.

Lunch Hour Lecture Series. A three-part series is scheduled for March 29, 30, and 31, from 12:10 to 12:40 p.m. The topics will be acupressure, self-hypnosis, and massage. The seminars will be held in the Kearny Mesa building 1 Program Development conference room.

For more information, read the *CRA Newsletter* or call the Health-Fitness Center at KM 3567.



Safe Drivers Receive Recognition. These Subcontract Management Department field representatives were each presented with a plaque and certificate for having contributed to the successful driving of over 4 million miles without injury or lost time over a 10-year period. Pictured from left to right are: F. Stevens, E. Ozanich, B. Emrich, R. Niski (chief, Subcontract Management), L. Suleski, C. Stewart, D. Stone (manager, Procurement Support), K. Hanken, W. Jones (manager, Subcontract Management), G. Darrah, K. Castor, B. Helm, D. Stinson, F. Young, and R. Turner.

Still Time for Blood Donors to Sign Up

Convair and Western Center employees can still "Celebrate Life" by making an appointment to donate blood next week. An active employee participation makes it possible to provide a no-charge replacement service to all employees and their dependents, depending on insurance coverage.

Rainbow "Celebrate Life" T-shirts will be given to all donors. Call now and make your appointment.

PLACE	TIME
Kearny Mesa	Monday & Tuesday,
Fire Station — Bldg 6	April 4 & 5
Call KM 1811 (Fire Dept)	8:00 a.m.-1:00 p.m.
Lindbergh Field	Wednesday & Thursday,
Classroom 1, Bldg 2	April 6 & 7
Call LF 8244 (Fire Dept)	8:00 a.m.-1:00 p.m.
Plant 19 — Trailer	Friday, April 8
Outside Bldg 4 F/A Sta	8:00 a.m.-4:45 p.m.
Call LF 8244 (Fire Dept)	

New Loan from Point Loma Federal Credit Union

A debt consolidation loan is now available through the PLFCU. These unsecured signature loans have an annual percentage rate of only 15% and can extend for up to 48 months. For more information or loan applications, stop by the PLFCU office on Sports Arena Boulevard, or call 226-1600.

Noon Movie: 'Egypt Partnership'

This week's movie is put out by the Catholic Relief Service. At Kearny Mesa, the showing will be at noon on Wednesday in classroom 3 of building 17. At Lindbergh Field, showings will be on Thursday in the building 5 auditorium at 11:00 a.m., noon, and 7:30 p.m.

Employment

For the week ending March 18, employment was 9,552.

CONVAIR Weekly Log April 4, 1983

Published by the Convair Division of General Dynamics

Quality Awareness



CAT training participants. Seated: E. Baird, M. Tamayo, Educational Services; V. Lima; R. Sinkule. Standing: K. Malberg, manager—Corrective Action; H. Barr; E. Slunka; D. Hagan; B. Lauson; A. Douds, Educational Services; F. Weigand; N. Broadbent.

CAT Teams Now in Place at Three Convair Plants

Three corrective action teams — called CAT teams — are now in place at the KM, LF, and Plant 19 cruise missile manufacturing areas. Each CAT team is made up of three members who are permanently assigned to help solve problems and nonconformances in cruise missiles manufacturing. Their permanent assignment at each manufacturing area helps ensure that our corrective action is both timely and effective.

Twelve Convair people recently completed an intensive, three-day training for CAT (nine CAT members and three corrective action engineers). The training covered the objectives of CAT as well as interpersonal and problem-solving skills. In the future, the training will be given to other Convair employees who have an impact on our corrective action efforts.

CAT is a part of our division's overall goal to build a quality product, on schedule and at budget.

Making a Difference

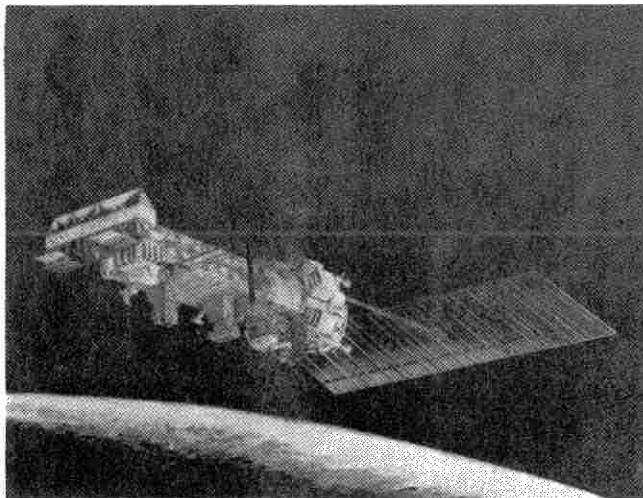
Cruise Missile FY82 Production Funds Announced

The announcement was made last week that Convair has been awarded approximately \$172 million to manufacture 142 Tomahawk all-up-rounds and related support equipment under the fiscal year 1982 cruise missile production contract.

BLOOD DRIVE BEGINS TODAY
Remember Your Appointment

Place	Time
Kearny Mesa	Monday & Tuesday,
Fire Station — Bldg 6	April 4 & 5
Call KM 1811 (Fire Dept)	8:00 a.m. — 1:00 p.m.
Lindbergh Field	Wednesday & Thursday,
Classroom 1, Bldg 2	April 6 & 7
Call LF 8244 (Fire Dept)	8:00 a.m. — 1:00 p.m.
Plant 19 — Trailer	Friday,
Outside Bldg 4 F/A Sta	April 8
Call LF 8244 (Fire Dept)	8:00 a.m. — 4:45 p.m.

Pick up your Rainbow-Celebrate Life T-shirt when you donate.



Artist's rendering of the satellite placed into orbit by Atlas E.

Atlas 73E Successfully Launches NOAA-E from Vandenberg

On March 28, Atlas 73E successfully placed into orbit the fifth in a series of eleven TIROS/NOAA spacecraft for the Air Force and NASA. NOAA-E is the first in the Advanced TIROS-N series built for the National Oceanic and Atmospheric Administration. In addition to its weather-monitoring capability, the satellite carries a search and rescue system onboard that can locate and indicate the position of emergency locating equipment from downed aircraft or ships.

Atlas 73E was originally sold to the Air Force in March 1963. Twenty years later, it has performed flawlessly in placing the RCA-manufactured satellite into an excellent orbit. This makes 471 launches for Atlas. The TIROS/NOAA series of Atlas launches began in 1978 and will continue into 1991. John Kring is the program manager for the Atlas-TIROS/NOAA program.

GLCM Overseas Assignments

Integrated Logistics Support is in the process of sending people to Greenham Common, England, to provide interim contract support (ICS) for the ground launched cruise missile weapon system. By the end of September, 24 people will have made the move to England. The group will be responsible for maintenance support of the GLCM system, including transporter-erector-launchers (TELs), launch control centers (LCCs), and trainers. The people represent a cross-section of Convair, such as engineers, quality assurance representatives, technicians and mechanics from operations, and data management and logistics personnel.

Greenham Common is Main Operating Base 1 (MOB 1) for the European deployment of GLCM. MOB 2 is in Comiso, Sicily. Beginning in May, the interviewing process will begin to select the group who will be sent to MOB 2 to provide the same type of support.

Convair people are already providing maintenance ICS at Davis-Monthan AFB in Tucson, Arizona, for the 868th Tactical Missile Training Squadron and the 512th Field Training Detachment. At DMAFB, we currently support five TELs, one LCC, two weapons control system trainers, one missile procedures trainer, and one interim warhead loading trainer.

NMACC Sponsors Course

Business Concepts. This is course 9 in the first-line supervisor program. It is designed to provide basic information on cost control, budgeting, and capital expenditures utilization. The seven-week class begins on Wednesday, April 13, and will be held from 4:30 to 6:30 p.m. in the AUR conference room, KM building 5, mezzanine floor, column H1-2. The cost is \$5 for NMACC members and \$15 for nonmembers. Enrollment is limited to 20. The facilitator will be Gil Olson. Register with Chris Yates at KM 3096 or Jim Denzien at KM 3108.

'Convairsations with Management' Continue

On Tuesday, April 5, Dr. Ray Beuligmann will discuss Convair's Energy programs. On April 12, Bill Rector and Dennis Dunbar will lead a session on our Space and 767 Strut programs. This is a good opportunity to find out the latest about these key company activities. The sessions are free. They will be held from 4:30 to 6:30 p.m. in the KM building 2 presentation room. For reservations, call Kathy Milhaud, KM 1803.

New Dialing Access for DSD/HQ

To call Data Systems Division headquarters through Convair telines from KM, dial 84 + 78 + XXXX (four digit ext). From LF, dial 100 + 84 + 78 + XXXX. This change is effective immediately.

From the Health-Fitness Center

Shape-Up. Class begins Monday, April 4 at 4:30 p.m. The cost is \$40 for nonmembers and free for HFC members.

Lindbergh Field Shape-Up. Shape-Up will begin Monday, April 4 at 4:30 p.m. (Please note the time change.) The cost is \$40 for nonmembers and free for HFC members.

For more information, see the *CRA Newsletter* or contact the Health-Fitness Center, KM 3567.

GENERAL DYNAMICS



"Be seein' you, Doctor!"

Forklifts are often abused or misused — results — accidents! Drivers: Keep alert, don't overload, don't haul human cargo!

SAFETY - DOING WHAT'S RIGHT!

Supervisors Safety Training Class Scheduled

Training of Operations supervisors in the safe operation of mechanical lifting equipment has been scheduled on Tuesday, April 5, and Tuesday, April 12, at the following locations and times.

LF	Building 14, room 7	8 a.m., 9 a.m., 5 p.m.
Plt 19	Building 2, conference room	12 noon
KM	Building 17, room 3	2 p.m., 3 p.m.

Each supervisor with personnel who operate mechanical lifting equipment (hoists, jibs, forklifts, etc.) is urged to attend this one-hour safety class. If you have any questions, call Klaus Flitner, LF 8340.

PLFCU Offers Direct Deposit

The Point Loma Federal Credit Union has a payroll direct deposit option for members. Pick up the necessary forms at Employee Benefits or call the PLFCU at 226-1600.

Noon Movie: 'High in the Himalayas'

This week's movie was produced by Sears Roebuck. At Kearny Mesa, the showing will be at noon on Wednesday in classroom 3 of building 17. At Lindbergh Field, showings will be on Thursday in the building 5 auditorium at 11:00 a.m., noon, and 7:30 p.m.

Employment

For the week ending March 25, employment was 9,545.

CONVAIR Weekly Log

April 11, 1983

Published by the Convair Division of General Dynamics

Quality Awareness

New Quality Circle Training To Begin This Week

Leaders of new Quality Circles and new facilitators will participate in training sessions this week. The training, led by Michele Tamayo and Kirk Gregg of Educational Services, will cover communication skills and problem-solving techniques.

The areas that have new Quality Circles since the last report in the *Weekly Log* are Engineering Management Services, ILS-Technical Publications, Manufacturing Control, Material Parts Release, and the TEL Strongback and Subassembly areas at Plant 19.

Other areas that have shown an interest in forming circles are Planning, Tool Design, Engineering, Tooling, Spare Parts, Receiving Inspection, and Machine Shop.

Under the ground rules of Quality Circles, the supervisor of a work-related group is selected as the leader of the circle. Supervisors are encouraged to contact Motivational Programs, KM 2256, for information on how to start a circle.

QUALITY CIRCLES — PUTTING OUR HEADS TOGETHER FOR POSITIVE CHANGE

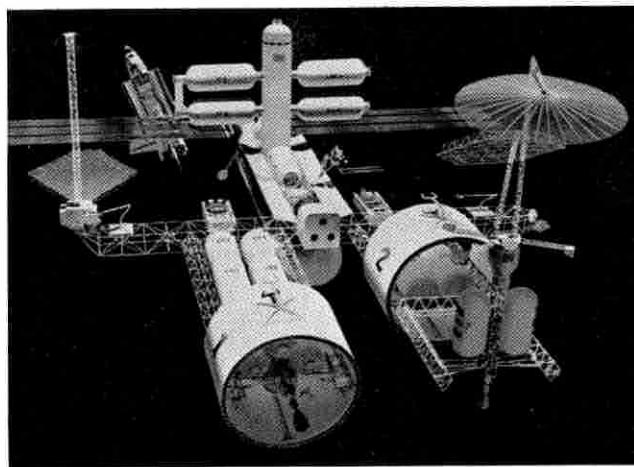
Making a Difference

Convair-Built Mid-fuselage Is Part of 'Challenger'

The third mid-fuselage built by Convair for the space shuttle has gone into space with the successful launch of *Challenger* on April 4. This mid-fuselage section was originally designed as a static test article. It performed so well in tests that it was decided to modify it for flight. Convair submitted the modifications in kit form to Rockwell and provided support people to help incorporate the modifications into the shuttle. The modifications were completed in December 1982.

General Dynamics has been under contract to NASA since 1973 for design and manufacture of the payload bay for the space shuttle orbiter. The first mid-fuselage we built became part of *Enterprise* and was used mainly for test atop a specially modified 747 aircraft. The second mid-fuselage, for *Columbia*, was delivered in February 1977. Right now, the mid-fuselage section for *Discovery* is at the Rockwell facility in Palmdale. One more will be delivered in May, eventually to become part of *Atlantis*.

Lloyd Munson is the program manager for the Orbiter Mid-fuselage. He, along with Bill Rector, vice president - Space Programs, and Doug Heydon, director - Space Marketing, attending last week's launch at Kennedy Space Center.



Artist's rendering of the standard space station evolved to full orbital transfer vehicle servicing.

Space Station Study Presented by Convair Team

A special team from Advanced Space Programs has completed an eight-month study for NASA on the architectural needs and attributes of a space station. In Convair's study, a space station is seen as an adjunct to the existing space transportation system, with the shuttle providing the means to establish a space station in low earth orbit. A permanent, manned space station would mean that industry, public services, and the science community could perform experiments and material processes in the high-visibility, zero-gravity environment of space. The station could serve as a launch platform to send satellites into higher orbit or planetary trajectory, and it could also serve as a garage in space to service satellites and orbital transfer vehicles.

Funding is also a factor in the conceptual study. As commercial use of the space station becomes viable, investment in its development by private industry is seen as an alternative to relying on government funding alone.

Otto Steinbronn, program manager, and Don Charhut, director - Advanced Space Programs, made the Convair presentation. We are one of eight companies who participated in these studies and made presentations to NASA the week of April 4.

Savings and Stock Plan Values for February

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.5356	\$ 2.8369	\$ 3.4452
Diversified Portfolio	2.0783	1.9593	2.7977
Fixed Income	1.1746	1.3063	1.4584
Hourly			
Government Bonds	2.5329	2.8335	3.4427
Diversified Portfolio	2.1237	2.0002	2.8558
GD Stock	\$33.7500	\$23.0000	\$41.8750

GLCM Support Equipment Shipments

Transporter-erector-launcher 1 (TEL 1) for the ground launched cruise missile system, which supported contractor and Air Force test and evaluations during 1982, completed refurbishment at Convair in March. Electronics equipment, including the forward equipment box from TEL 1, was removed and will be used at Convair to validate TEL/LCC automatic test equipment currently being developed by Avionics Engineering. TEL 1, less the electronic equipment, was shipped to Davis-Monthan AFB on March 31, where it will join TEL and LCC training equipment already in use at Davis-Monthan.

The first production launch control center, and the fourth built at Convair (LCC-4), was accepted by the government on April 8. It will also be shipped to Davis-Monthan AFB later this month.

Fifty-four articles of GLCM-peculiar support equipment were accepted by the government in March and have been shipped to Tinker AFB. Thirty-eight additional articles will be delivered early this month following first article testing currently in process.

Great Talent Search — Second Edition



THE GREAT TALENT SEARCH SECOND EDITION

Twenty new engineers have joined the Convair Division so far in 1983 as a result of employee referrals through the Great Talent Search. The first award under the 1983 program will go to Dennis Giaruso for referring George Christensen, a manufacturing engineer-senior, as soon as George has satisfactorily completed 90 days of employment.

Four more award winners for 1983 referrals are Frank Szafranski for Charles Dunkle, test engineer; John Vetter for Ron Hall, M&P engineer; Ken Mroz for Wayne Mount, test engineer; and Ernie Gravelle for Leslie Auber, test engineer. The remaining 15 engineers started in 1983 as a result of referrals from 1982.

Many participants and award winners of the GTS program are referrals themselves. It appears they are able to see first hand the program's advantages.

You too can be a winner by submitting your engineering and scientist referrals. See the program brochure, the cardboard backing of your GTS notepad, or drop by Professional Staffing (east end of building 1, first floor, KM) for details. Referral cards are at major vending locations and in the blue drop boxes at plant entrances. Call David Ibarra, KM 6331, for more information, and watch the *Weekly Log* for a Great Talent Search promotional incentive.

General Dynamics Computer Fair Scheduled

The General Dynamics San Diego Computer Fair will be held on Saturday, April 16, from 10 a.m. to 4 p.m. in the Kearny Mesa main dining area. Sponsored by CRA, in cooperation with Convair, Electronics, and Data Systems Divisions, this fair is open to all General Dynamics employees, their families and friends. Admission and refreshments will be free.

Over 30 exhibitors will display a wide variety of personal computer hardware and software including Apple, IBM, TRS-80, Sony, Atari, Commodore,

Xerox, Texas Instruments, and many more. All of the exhibitors have been apprised of General Dynamics' personal computer plan and have been asked to present their latest products and best discounts as well as special Fair prices on various items.

Running concurrently in an adjacent dining room, the CRA Personal Computer Club will have configurations of the Apple IIe, IBM PC, Victor 9000, Atari 800 and TRS-80, with member-owners available to answer questions.

The objective of the Computer Fair is to assist employees in the selection of personal computer systems and to provide sound advice on what will suit their needs. For additional information, call the CRA at KM 1111 and watch your area bulletin boards for flyers.



Tool Design Training Completed. Six Convair employees, who were selected to participate in Tool Design training, have completed the course. The program consisted of 6 weeks of classroom training followed by 16 weeks of on-the-job training. Ed Stelmach (center), supervisor in Tool Design, recently presented certificates to Ted Nowaski, Tom Thornton, Tom Davey, and Jerry Schwab. Dave Henrie also took the training but was not available when the photo was taken.

"Convairsations with Management" Schedule
Here is the schedule for the next four "Convairsations with Management."

Date	Subject	Speaker
Apr 12	Space Programs/ 767 Strut	Bill Rector & Dennis Dunbar
Apr 19	No meeting scheduled	
Apr 26	Quality Assurance	Dave Archibald
May 3	DCAS	Capt. John McKechnie
May 10	Cruise Missiles Program	Frank Thompson

The meetings are held on Tuesdays from 4:30 to 6:30 p.m. in the KM building 2 presentation room, unless otherwise announced. The programs are free and open to all Convair people. This is your chance to meet division management and hear the latest about Convair developments. Call Kathy Milhaud, KM 1803, for reservations.

Daylight Savings Time Is Coming

We will turn our clocks AHEAD one hour as of 2 a.m. on Sunday, April 24, when Daylight Savings Time goes into effect. The shift hours of employees reporting to work at 7 a.m. on Sunday, April 24, or any time after that, will conform to local Daylight Savings Time.

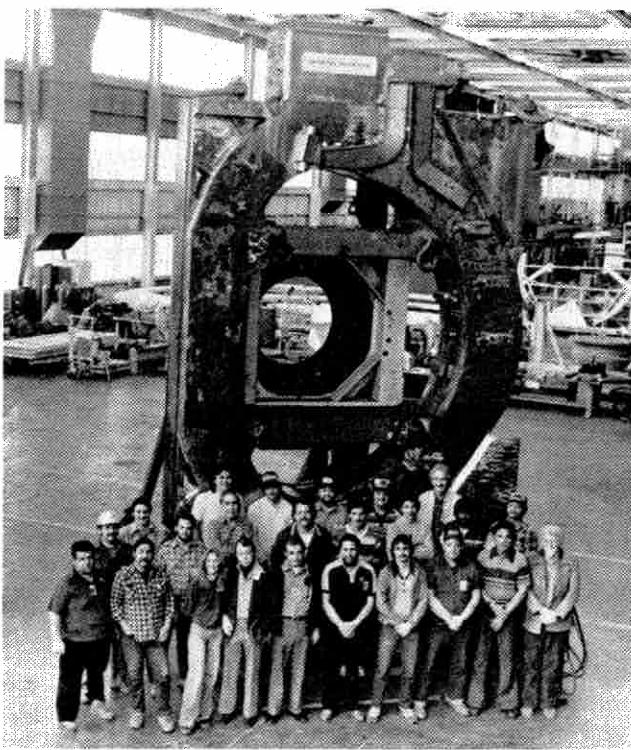
Employment

For the week ending April 1, employment was 9,497.

CONVAIR Weekly Log

April 18, 1983

Published by the Convair Division of General Dynamics



Large Coil Program Achieves Key Milestone

A key event in Convair's Energy Systems work took place last week when we shipped a superconducting large coil for final machining. Upon completion of machining, the large coil will be shipped to Oak Ridge National Laboratory in Tennessee for delivery in mid-May to the Large Coil Test Facility.

The Large Coil Facility will ultimately contain and simultaneously test six large coils similar to the one fabricated by Convair. Three of these coils are being fabricated in the United States, and one each in Japan, Switzerland, and Germany. Initial testing will be accomplished using the Convair and Japan coils, which are about one year ahead of the other coils.

Last week at Plant 19, two 60-ton cranes loaded the large coil onto a low-bed truck trailer with multiple axles to distribute the coil's 48-ton weight. The same truck trailer will be used next month to transport the coil to Oak Ridge National Laboratory.

Dr. Ray Beuligmann, Energy Systems program director, expressed his appreciation for an outstanding effort by everyone associated with this superconducting magnet program. That includes people from Engineering, Operations, Quality Assurance, Procurement, Estimating, and Finance. Dave Hackley is the program manager.

Performance of the large coil is crucial to Convair's winning future programs to design and produce these toroidal field superconducting magnets for fusion power plants.

Congratulations! ACM Win

Because of the individual efforts of all Convair employees, the Air Force on April 15 awarded us a full-scale development contract for the second-generation Advanced Cruise Missile. On behalf of the ACM team, thank you to all Convair people who worked together for this achievement.

**Bill Vega
Program Director**

Convair Designated as Tomahawk AUR-SEIA

In February of this year, the Joint Cruise Missile Project Office named Convair as the All-Up-Round Systems Engineering and Integration Agent (AUR-SEIA) for the Tomahawk cruise missile program. As such, Convair was charged with authority and sole responsibility for ensuring performance and design compatibility of all elements of the all-up-round, that is, the air vehicle itself and associated capsules, rockets, etc. Thus, technical direction and oversight is provided for the 44 design agents (associate and subcontractors) contributing to the Tomahawk AUR, including Convair's BGM-109 airframe development.

On April 18, Mike Keel, vice president and program director, Cruise Missiles, Dr. Jim Karam, director, AUR-SEIA, and other key SEIA managers will begin a tour of principal design agents and associated agencies which interface with the AUR-SEIA function. They will visit 14 locations across the country in seven days. Their success and our support is critical to achieve Adm. Hostettler's objective: "...to improve overall Cruise Missile management through placement of strong emphasis on system engineering and disciplined approach to meet the complex integration requirements of this project."

Tomahawk Scores

Tomahawk T106 was successfully launched and flight tested on April 14. Launched from the USS La Jolla, it performed a conventional land attack mission over the inland test route to the Tonopah Test Range and achieved target impact. This was the first Tomahawk launch from the USS La Jolla and the 89th flight in the flight test program. All major objectives were met.

Convair Exhibits at Navy League Exposition

The 1983 Navy League Sea-Air-Space Exposition was held in Washington, D.C. on March 29, 30, and 31. The exposition brought aerospace and defense companies together with government leaders, military officers, and civilian personnel from a wide range of major government agencies for three days of exhibits and technical briefings.

The General Dynamics exhibit, called "Sea Power '83," covered key Navy programs from five divisions: Quincy Shipbuilding, Pomona, Electric Boat, Electronics, and Convair. Our portion of the exhibit featured Tomahawk and MRASM and included the midbody from Tomahawk T83 off the production line. In addition to the exhibit, General Dynamics conducted technical briefings on how our products meet advanced Navy requirements. Attendees report much interest shown in the Tomahawk story and in the total General Dynamics briefing.

Requirements Generation System Training Available

A videotape-based training program providing an overview and discussion of Convair's Requirements Generation System (RGS) is now available. The RGS is a complex system that defines requirements for purchased parts and materials and in-house manufactured parts and assemblies. It involves the efforts of many major departments and functions and the use of several computer systems.

The training program covers the system from the sales order through engineering, scheduling, tooling, and manufacturing engineering to manufacturing, material control and, ultimately, procurement or in-house manufacture.

Jim Cleghorn has joined the Educational Programs staff to provide this training. The program is about two hours long. Supervisors who wish to use the program can schedule the required sessions by calling Educational Programs at KM 2236.

CPR Training Offered

Susan Shean, R.N., Lindbergh Field central medical, reports that response to cardiopulmonary resuscitation training has been outstanding. To meet the continuing need for this life-saving technique, the next training has been scheduled for May 2 and 4 from 5 to 9 p.m. at the KM cafeteria. Attendance is required at both classes for initial certification or recertification. The class is open to employees, family, and friends. A registration fee of \$5 per person, due before April 22, will confirm each reservation. Upon completion, the \$5 can either be returned or donated to the American Heart Association. Please phone your reservation to the KM Fire Station, KM 1811, and mail your check — payable to the American Heart Association — to J. Boucher, MZ 50-1315.

Notice

Daylight Savings Time goes into effect this weekend. As of 2 a.m. Sunday, April 24, we will turn our clocks AHEAD one hour. The shift hours of employees reporting to work at 7 a.m. on April 24 or after will conform to local Daylight Savings Time.



Quality Circle training participants (left to right): B. Finlay, J. Love, J. Tyson, J. Lundy, J. Benham, K. Gregg, M. Tamayo, H. Sarkisian, B. Teran, R. Baade, J. Parrotte, and F. Nordstrom.

Quality Circles Training Produces

People Working Together To Solve Problems

Fourteen people completed the new training program for Quality Circles last week at National University. The group included future leaders of circles, two new facilitators, and one representative each from Electronics and Datagraphix. The new training is a pilot program that emphasizes practical and systematic ways to solve work-related problems.

The current Convair goal is to have 50 to 60 new circles in operation by the end of 1983. As the number of active circles increases and the program gains maturity, the *Weekly Log* will provide updates on such measurable achievements as cost savings and improved quality. For information on Quality Circles, call KM 2256.

'Convairsations with Management' Continue

The next three "Convairsations" sessions are:

Date	Topic	Speaker
April 26	Quality Assurance	Dave Archibald
May 3	DCAS	Capt. John McKechnie
May 10	Cruise Missile Programs	Frank Thompson

Meetings are held Tuesday evenings from 4:30 to 6:30 in the KM building 2 presentation room. Call Kathy Milhaud, KM 1803, for reservations.

KM Mailroom Moves

Effective Monday, April 18, the KM mailroom will be in a new location at column J-16 in building 5. This is in the southeast corner of the building on the main floor. If you are entering from the west side, go through the third set of double doors as you face north. If you are entering from the east side, go through the second set of double doors as you face north. The "hotbox" will be located in Graphics/Reproduction in building 4 next to the stamp machine.

Computer Fair Held April 16

The General Dynamics San Diego Computer Fair was held last Saturday at the Kearny Mesa cafeteria. As the *Weekly Log* went to press, preparations were being finalized for the one-day fair at which over 30 exhibitors showed personal computer equipment. Look for a full report in next week's issue.

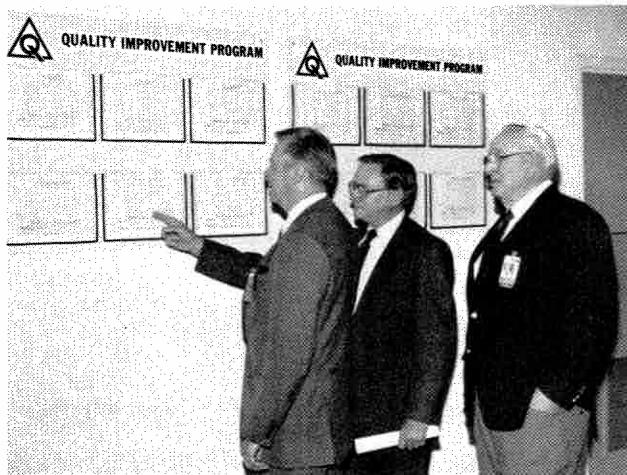
Employment

For the week ending April 8, 1983, employment was 9,497.

CONVAIR Weekly Log

April 25, 1983

Published by the Convair Division of General Dynamics



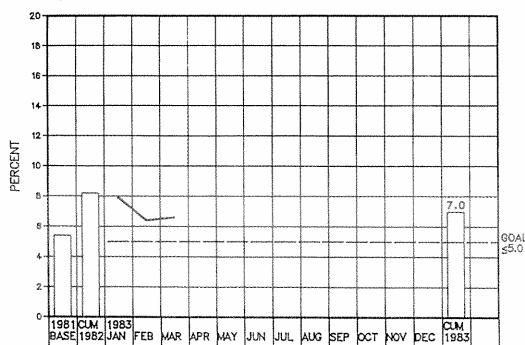
Dave Archibald, John Barrons, and Howard Hart stop to examine the QIP display in building 1 at Kearny Mesa.

QIP Update

The March 28 issue of the *Weekly Log* introduced the General Dynamics Quality Improvement Program and pointed out the QIP displays throughout Convair. As you recall, QIP is a corporate-wide program to improve quality through goal setting, measuring results, and training. The QIP displays, at 18 visible locations throughout the three Convair plants, contain 12 charts that track quality performance indicators. Data for the first three months of 1983 has now been incorporated into the charts. To keep us focused on what the charts indicate, the *Weekly Log* will update each of the 12 charts in continuing reports.

We'll look first at overtime. The overtime chart tracks the division-wide total overtime hours as a percentage of straight-time hours (both direct and indirect). QIP guidelines are clear about excessive overtime contributing to higher energy use, personnel inefficiency and fatigue, management problems, and poor communication — all quality inhibitors. The QIP goal is to hold overtime to a 5% level. Our chart shows that we started with a cumulative overtime total of 8.2% for 1982. So far in 1983, overtime is down to 6.6%, for an overall average of 7% three months into 1983.

Overtime



Longest Flight for Sea Launched Tomahawk

On April 16, Tomahawk T78 was successfully launched from the USS *La Jolla* submerged in the waters near San Nicholas Island. The missile flew a typical land-attack mission to the Utah Test Range, where it was successfully recovered. T78 was the 100th flight of a Tomahawk missile and the longest flight (two hours) for a sea-launched missile. T78 will be refurbished for a flight in the fall of this year from the USS *Merrill*.

Convair Product Notes

Another Atlas. Atlas 63E was shipped from Plant 19 to Vandenberg Air Force Base last week for refurbishment following welding installation of the tank ring kit.

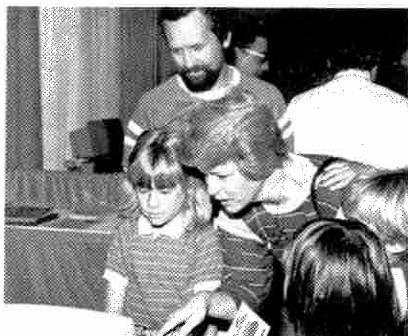
Aircraft Subcontracts. The 69th shipset of 767 struts was delivered to Boeing on April 21.



Good News for 767 Team

Since mid-1982, customer satisfaction with on-time deliveries has been a hallmark of the Boeing 767 Strut program. Adding to the success of this program is the quality level that has been achieved by the 767 strut manufacturing and support team. Reports from Boeing in Seattle show a major reduction in rework hours and customer rejections since the beginning of 1983. A new Buzby Bee poster is bringing the news of this achievement to the 767 Strut team. Buzby Bee has been the official mascot of the 767 program since October 1980.

Scenes from the CRA-sponsored Computer Fair



Between 3,000 and 4,000 General Dynamics employees and family members attended the computer fair at Kearny Mesa on April 16. Sponsored by CRA in conjunction with Convair, Electronics, and Data Systems Divisions, the fair provided the chance to get good sound advice on personal computers and to see the hardware and software demonstrated in an atmosphere of information exchange. Twenty-eight exhibitors showed personal computer equipment. In addition, Carol Dysart, professional personal computer consultant, conducted hourly talks and answered questions on what personal computers can do. According to CRA's Steve Woolley, the fair was "an unqualified success" from the point of view of both employees and exhibitors.



Congratulations, Convair employees! Oliver C. Boileau, president of General Dynamics, presents a Certificate of Achievement for Excellence in Safety Performance for 1982 to Augie Daddi, director of Industrial Relations, who accepted the award on behalf of Convair. Thanks to the efforts of all employees, Convair compiled a safety record significantly better than the national average for similar industries.

Blood Drive a Success

Convair and Western Center employees contributed generously in the recent blood drive. Seven hundred ninety-five donors participated and 684 units of blood were drawn.

All employees and their eligible dependents may draw from the Convair reserve fund. No employee needs to solicit his or her own donors in time of need. If you or your dependents require units from the blood bank, bring or send your billing to KM Employee Benefits (MZ 50-1311). Credits will be transferred to your account from the Convair blood reserve fund, thereby reducing or eliminating blood bank charges. Any questions concerning eligibility should be directed to Employee Benefits, KM 2657.

Some "Celebrate Life" T-shirts left from the drive. If you contributed blood to the Convair Reserve Fund at the Blood Bank, bring your receipt to the closest Central Medical and receive a shirt while they last.

Notes About Convair People

Davis Wins Essay Contest. Dean Davis has won second place in an essay contest sponsored by the National Space Institute and *Space World* magazine. His essay, "The Next 25 Years in Space, What, Where and Why," will be published in the October issue of *Space World*. Davis is a senior engineer on Space Programs in Operations Research.

Weisinger Presents Paper. Don Weisinger, senior engineering specialist in Materials and Processes, presented a paper at the Conference on Design of Armor Systems at the Naval Postgraduate School in Monterey on April 21. The conference provided a forum for technical information on armor materials for enhanced aircraft survivability. Weisinger's presentation was on the armor system of the Ground Launched Cruise Missile, which has potential applications in aircraft for crew seats, side armor, and as containers for vital components.

Journeyman Certificate Awarded. Jamie Box was recently awarded his journeyman certificate by Bill Martin, chief of Tool Manufacturing. Box graduated from the apprenticeship program as a jig and fixture builder-A.

Convairsations with Management Schedule

Date	Topic	Speaker
April 26	Quality Assurance	Dave Archibald
May 3	DCAS	Capt. John McKechnie
May 10	Cruise Missile Programs	Frank Thompson

Meetings are held Tuesday evenings from 4:30 to 6:30 p.m. in the KM building 2 presentation room. Call Kathy Milhaud, KM 1803, for reservations.

Employment

For the week ending April 15, employment was 9,509.

CONVAIR Weekly Log May 2, 1983

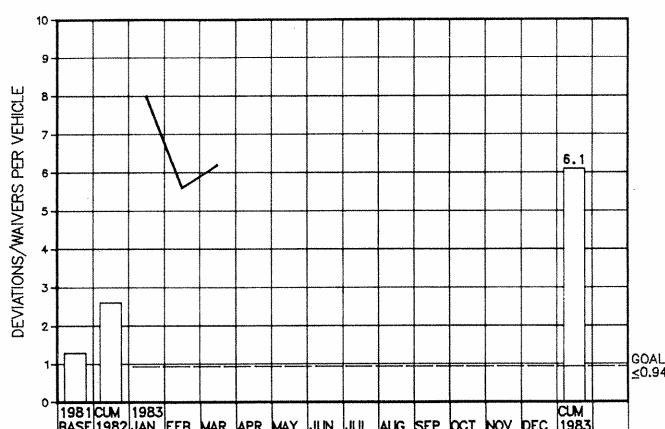
Published by the Convair Division of General Dynamics

Quality Awareness

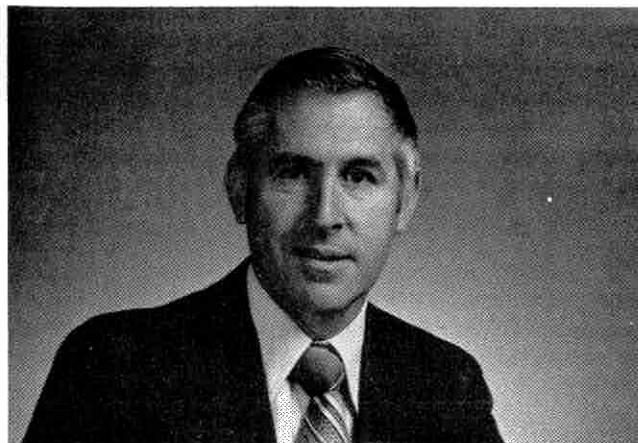
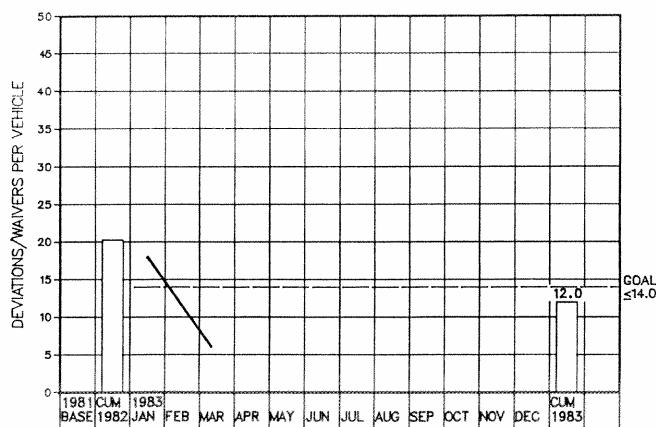
QIP Update

Let's look at deviations and waivers. A deviation is written authorization to depart from a particular performance or design requirement, granted before manufacture. A waiver is written authorization for items found to depart from requirements during production but still considered to be suitable for use "as is" or reworked. The charts track deviations and waivers for Tomahawk all-up rounds and the TEL/LCC. The 1983 goal is a 20% reduction in the number of deviations and waivers over 1982.

Deviations/Waivers — Tomahawk Missile



Deviations/Waivers — TEL/LCC



Convair's New General Manager: John McSweeny

John E. McSweeny has been named vice president and general manager of General Dynamics Convair Division effective April 25, 1983. Since December 1982, Mr. McSweeny has served as division vice president and deputy general manager.

He began his career with General Dynamics Pomona Division in 1961 as a senior electronics engineer. In May 1972, he was named director for the Phalanx Missile Program and successfully led the breakthrough in gun fire-control technology. He was named vice president and program director - Navy Moderate Range Tactical Systems in November 1976, which included Phalanx, the RAM missile system, and guided projectile development. In July 1980, he became division vice president and deputy general manager. His responsibilities included policy guidance and management of Pomona Division programs during engineering development, production, and field support service. In December 1981, he was named division vice president and deputy general manager - Finance and Administration.

McSweeny is a member of the Institute of Electrical and Electronic Engineers. He, his wife Jeannette, and four children are in the process of moving to San Diego.

New Challenges for MRASM Program

A key milestone for the Medium-Range Air-to-Surface Missile Program was achieved on March 11, when flight tests conducted at the Mojave Test Range validated the lateral dispensing system concept. MRASM's lateral dispensing system uses high-pressure air bags to laterally eject runway-cratering submunitions. The dispenser critical design review is now scheduled for May 25 and 26.

In a related development, the Joint Cruise Missiles Project has awarded a contract to AVCO to develop the submunitions. AVCO's BLU-106B, a kinetic energy penetrating submunition, uses rocket motors to drive the munitions into and underneath a runway to produce a cratering explosion.

Here at Convair, the MRASM program has been restructured, and the full-scale engineering development

contract has been extended through June 1986. The Air Force has expressed firm support for MRASM. Convair's challenge is to develop this low-cost, tactical variant of Tomahawk to meet technical, cost, and schedule requirements.



Missile Procedures Trainer Team Recognized

Members of the GLCM missile procedures trainer (MPT) team were recognized at a special presentation on April 27. A group of about 80 people, representing Research & Engineering, Procurement, Integrated Logistic Support, Quality Assurance, and Data Systems Division - Western Center were recognized for their exceptional efforts to complete the development and fabrication of the first MPT system ahead of schedule and under budgeted cost. The first unit was delivered to Davis Monthan AFB and is being used to train GLCM launch crew officers.

Dan Da Pra, vice president - Research & Engineering, presided over the presentation, during which each employee received an EXCEL award. He commented that their fine effort had achieved a critical milestone for GLCM initial operational capability. Col. Don Couture, JCMP program manager - GLCM systems, also spoke. He said that user reports indicate the performance of the MPT far exceeds their expectations. Also participating were Orison Wade, MPT program manager; Terry Straeter, DSD-WC director; and Jerry Butsko, GLCM director. Bill Lowe, MPT chief engineer, received special recognition for his leadership of the program.

SLCM Vertical Launch Program Tests Continue

A calibration test run was conducted on the submersible shock test vehicle (SSTV) off San Clemente Island on March 14 in support of the vertical launch program for the sea launched cruise missile. The run was a functional test of the system in preparation for a series of 10 shock tests that began in April. The SSTV is a simulated submarine section with SSN 688 vertical launch tubes and two test vehicles. The object of the tests is to measure shock loads transmitted through the capsule launch system to the missile. The first three shock tests were successfully performed on April 16, 21, and 26. After the tests, the launch test inert vehicles were removed from the SSTV, decapsulated, and inspected. Inspections show no apparent damage or degradation of hardware. Seven more shock tests are planned.

Convair Product Notes

Aircraft Subcontracts. Fuselage 398 (KC-10 No. 20) was delivered to McDonnell Douglas on April 22.

Shuttle Mid-fuselage. Assembly is complete on orbiter vehicle 104, scheduled to become part of the *Atlantis*. It was removed from the fixture on April 29 and weighed in preparation for shipment to Rockwell at Palmdale.



Service Award Breakfast

Employees who have completed 35, 40, or 45 years of service with Convair were honored at a breakfast hosted by John McSweeney, deputy general manager, on March 25. Awardees received service awards and a color photo as a memento of the occasion. Front row (left to right): Monte Cottrell (35 years), Harold Miller (40), John McSweeney (staff), Mary Hardy (40), Hawley Skilton (35), Herbert Buehner (35). Second row (left to right): Carlos Mendoza, Jr. (40), Chuck Wilson (staff), Joe Rice (40), Lloyd Munson (40), Dave Cormany (staff), Richard Frey (35), Dave Archibald (staff), William Colahan (35), and George Roos (staff).

They Retire in March

Thanks and best wishes to each of these Convair employees who retired in March 1983. So many employees retired in March that we are only printing half the list (the rest will appear next week).

Name	Department	Years of Service
Gerald W. Allen	451-0 Plaster processor	44½
Joseph E. Arnold	283-3 Matl release analyst A	26
Charles W. Brink	046-0 A/C assembler - S+S A	36½
Joseph W. Coddou	117-0 Project engineer, sr	29½
William L. Colahan	301-0 QA-project administrator	35
Robert J. Donaldson	221-1 Stock clerk A	26
Traville Doucette, Jr.	250-5 Crane rigger A	32
Robert C. Emerson	427-0 Engr spec-mfg engr	39
William P. Espinosa	676-0 Design drafter	42
Donald E. Evanson	241-1 Engineering spec-IE	32
Clifton R. Greenwood	223-1 Production order analyst	40
Dick L. Greer	603-0 Engineering chief	32

'Convairsations with Management':

Last Two Sessions Scheduled

The last two sessions of "Convairsations" will be DCAS on May 3 with Capt. John McKechnie and Cruise Missile Programs on May 10 with Frank Thompson. Meetings are held from 4:30 to 6:30 p.m. in the KM building 2 presentation room. They're free and open to everyone. Call Kathy Milhaud, KM 1803, for reservations.

Employment

For the week ending April 22, employment was 9,508.

CONVAIR Weekly Log May 9, 1983

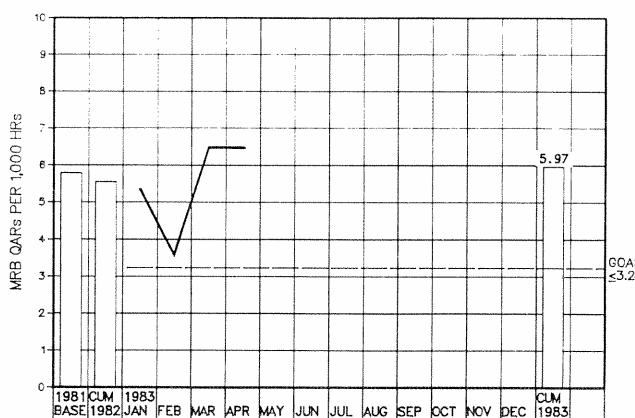
Published by the Convair Division of General Dynamics

Quality Awareness

QIP Update: MRB QARs

The volume of rejection documents (QARs) processed in the Material Review Board is a reflection of the amount of nonconforming hardware generated in the manufacturing process. MRB actions require customer approval and, thus, provide high visibility of the nonconformance as well as the effectiveness of the corrective action system. The QIP measurement determines the number of QARs received in MRB per 1,000 manufacturing direct labor hours. The goal is to reduce this number, thereby reducing costs involved in material control, handling, MRB labor, repair planning and labor, scrap, and corrective action. The data for the first four months of 1983 indicate MRB QARs per 1,000 hours are 6.45, above the QIP goal of 3.24.

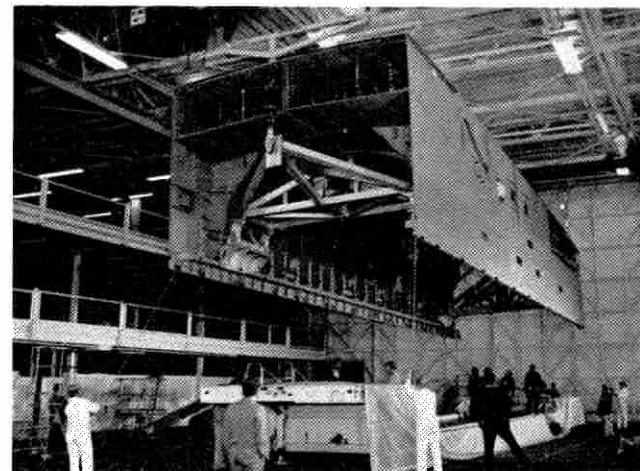
MRB QARs



Making a Difference

April Was Banner Month For Tomahawk Deliveries

Thanks to the outstanding efforts of the production team and all supporting organizations, a total of 12 Tomahawk cruise missiles were completed and sold during April, the highest monthly total yet achieved. The first five production GLCM vehicles were completed. The last four operational vehicles, three antiship and one conventional land-attack, for the USS *New Jersey* were also completed in April. In addition to the production vehicles, two flight test Tomahawks, T106C-2 (conventional land-attack) and T78A-2 (nuclear land-attack) were delivered to and successfully launched by the USS *La Jolla* during April. A third flight test vehicle, T84A-1, was completed and delivered to Pacific Missile Test Center for ship Vertical Launch System flight test.



Shuttle mid-fuselage being lowered onto the trailer for transportation to Rockwell.

Final Mid-fuselage For Shuttle Delivered

OV-104, the fourth Shuttle mid-fuselage built by Convair, was delivered to the Rockwell facilities at Palmdale on schedule on May 6. The wide-load cavalcade left San Diego on May 5 and traveled to Palmdale during the middle of the night. As their final task before shipment, Convair personnel at Plant 19 weighed the mid-fuselage. Weight is of critical importance, since it is advantageous to have more weight available for the payload. OV-104 weighed in under the gross weight specified by the contract — it weighed between 12,200 and 12,300 pounds. All mid-fuselages have been under contract-specified weight. At Rockwell, the mid-fuselage will be assembled into the orbiter *Atlantis*.

We have received a subcontract from Rockwell to begin manufacturing the OV-105 orbiter mid-fuselage, which will serve as a structural spare. If NASA should authorize a fifth orbiter in the future, this mid-fuselage, and major spare components such as wings and tails being built by other subcontractors, will be available. Work on OV-105 is expected to begin in the near future.

OTV Servicing Study Presentation Completed

The final presentation for the orbital transfer vehicle servicing study took place at NASA/Marshall Space Flight Center on April 25. Under an eight-month contract, the study examined and defined space station development missions for servicing space-based OTVs. The OTV is a cryogenic upper stage that will offer performance improvements over vehicles carried to orbit in the Shuttle, improvements such as reusability and greater payload capacity. The Convair study produced technical and planning information for developing space-based OTV capability. A follow-on phase to the contract will begin in June.

The study was performed under Otto Steinbronn, Space Station Programs manager, with John Maloney as the study manager.

AUR-SEIA Tour Concludes

In February of this year, the Joint Cruise Missile Project named Convair as the All-Up-Round Systems Engineering and Integration Agent (AUR-SEIA) for the Tomahawk Cruise Missile program. As such, Convair is charged with authority and sole responsibility for ensuring performance and design compatibility of all elements of the all-up-round.

Mike Keel, Cruise Missiles vice president and program director; Dr. Jim Karam, AUR-Systems Engineering & Integrating Agency director; Dick Vieth, MDAC guidance design manager; and other AUR-SEIA managers conducted a tour of principal Tomahawk AUR design agents (associate and subcontractors) and associated government agencies during April 18-26. The 6,000-mile tour was considered an unqualified success in establishing working relationships with AUR-SEIA and highlighting near-term efforts of the AUR-SEIA.

According to Dr. Karam, the positive team-building attitude evident in each of the meetings will contribute to the technical excellence of the Tomahawk All-Up-Round Program.

Convair Product Notes

Space. Atlas 75E has been erected at Vandenberg AFB. It will launch a Global Positioning System (NAVSTAR 8) satellite this summer.

GLCM-MPT. Marriage testing of the operational GLCM missile procedures trainer (ICU-2 and LCC-4) is complete; the units have been prepared for shipment.

Aircraft Subcontracts. The 70th shipset of 767 struts was delivered to Boeing on schedule on April 29.

Overseas Assignments — PEP Works!

Through the Professional Enhancement Program (PEP), nine employees were selected to join the GLCM technical support team in Greenham Common, England. A similar group is now being formed for location in Comiso, Sicily, and team members are needed in the following classifications:

- Business administration
- Senior engineers
- Engineering documentation
- Field service maintenance
- Field service quality assurance

Requirements for these positions are briefly described in the current PEP bulletin. Employees who have experience commensurate with the position requirements, and who wish to be considered, should submit a PEP application. Applications are available at all PEP bulletin board locations.

KM - bldg 26, ground floor central vending area
KM - bldg 4, library entrance

KM - main dining room, inside west entrance

LF - bldg 5, second floor lunchroom

LF - bldg 4, south end of mezzanine vending area

LF - bldg 8, near ground floor vending area

Plt 19 - bldg 2, main vending area

Seville Plaza and Mission Plaza



Great Talent Search 'Bonus Week'

Last week, 1983 GTS participants were mailed a packet illustrating a bonus award incentive in recognition of their support of the Great Talent Search — Second Edition. This incentive, "Bonus Week," will give employees an opportunity to earn a Garnet merchandise award when an application or resume for one of the eligible engineering positions is received along with the referral card for that referral. You, too, can be eligible for this special promotion if a referral card is received by Professional Staffing (MZ 11-1342) by Tuesday, May 17. A complete packet will be mailed to the homes of all participants, so please enclose your current address along with your referral card to expedite processing. For more details, call the GTS office at KM 6331.

Final 'Convairsations' with Management

The last "Convairsations with Management" session will be on May 10, when Frank Thompson speaks about the Cruise Missile program. The meeting will be held from 4:30 to 6:30 p.m. in the KM building 2 presentation room. It's free and open to all employees. Call Kathy Milhaud, KM 1803, for reservations.

Tech Pubs Group Moves

The Technical Publications Reports Group (Dept 264-0) will be in a new location Monday, May 9. The group will be on the third floor (north side) of building 3.

They Retired in March

Thanks and best wishes to each of these Convair employees who retired in March 1983.

Name	Department	Years of Service
Leona M. Hoffman	310-0 Secretary	26
James W. Hyland	250-5 Crane rigger A	29
Homer L. Knapp	463-0 Grind machinist TL & Cut	29½
Louise A. Liggett	343-0 Ins-precision parts A	31
Everett A. Lindem	133-1 Industrial relations rep-sr	24
Vernon L. Lintvedt	633-5 Scientist-sr	28
Gerald W. Lucas	950-1 Project engineer-sr	27
William G. Martin	404-0 Chief-mfg engineering	28
William S. Mears	241-2 Engineer-sr-IE	26
Norma M. Morgan	431-0 Product planner-sr	27
Gerald D. Peddie	473-0 Engineer mfg engr-sr	32
Lawrence R. Potter	269-0 Logistics supervisor	33
Jenny M. Rowan	050-0 Painter-ident marketing	26
Donald L. Smock	250-2 Facilities drafter-sr	30
Frank F. Stevens	808-1 Subcontract rep-sr	45
James G. Sugg	340-0 Supervisor QA	42
Jack D. Timmons	015-0 Drill press operator A	13
Charles E. Turner	015-0 Ldr-mch-LG1	27
Nicholas L. Valentino	015-0 Milling machine machinist	30
Ralph S. Verner	422-0 Tool & mfg engineer-sr	30
Leroy Walton	761-0 Missile mech A	24
Kerby C. White	979-1 Lnch srv mech-sr-OSB	26
Leonard Young	015-0 Group ldr-mch-LG1	5
Kenneth T. Younghusband	673-0 Engineer-sr	30

Employment

For the week ending April 29, employment was 9,494.

CONVAIR Weekly Log

May 16, 1983

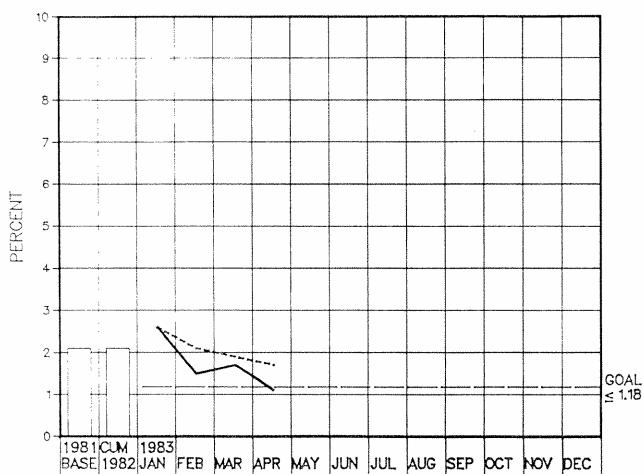
Published by the Convair Division of General Dynamics

Quality Awareness

QIP Update: Scrap

Scrap is nonconforming material that is not usable and cannot be economically reworked or repaired. The negative effect of excessive scrap is that it causes program overruns and schedule slippages. Therefore, the Quality Improvement Program sets a goal and then measures actual hours spent on scrapped parts as a percentage of the total manufacturing direct labor hours. Our goal is to reduce scrap to a year-to-date average of not more than 1.18 percent. We are currently in a favorable trend, represented by the dotted line which is the year-to-date average for the first four months of 1983.

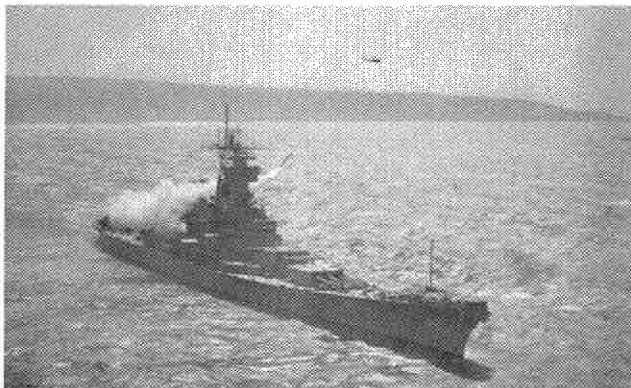
Scrap



Making a Difference

GLCM Weathers Testing

The Ground Launched Cruise Missile weapon system is undergoing climatics environmental testing at the large climatics chamber at Eglin AFB, Florida. A joint Convair and U.S. Air Force team, headed by Bob Black, Engineering Flight Test, is conducting the test. Since early April, a transporter-erector-launcher, a launch control center, and a Tomahawk all-up round (T71) have been involved in low-temperature tests to as low as -50F. The remainder of the test program will include exposure to temperatures as high as +135F and to simulated rain, snow, sand, and dust environments. Test completion is scheduled for late June.



First Tomahawk Launch from USS New Jersey

Tomahawk T79 was successfully launched on May 10 from the USS *New Jersey* under way off the California coast. The test marked the first launch of the Tomahawk from the recommissioned battleship.

The Tomahawk was fired from one of eight armored box launchers aboard the ship, each capable of launching four cruise missiles. Powered by its turbofan cruise engine, the Tomahawk flew a fully guided simulated conventional land attack mission of approximately 500 miles to a target area at the Tonopah Test Range, Nevada.



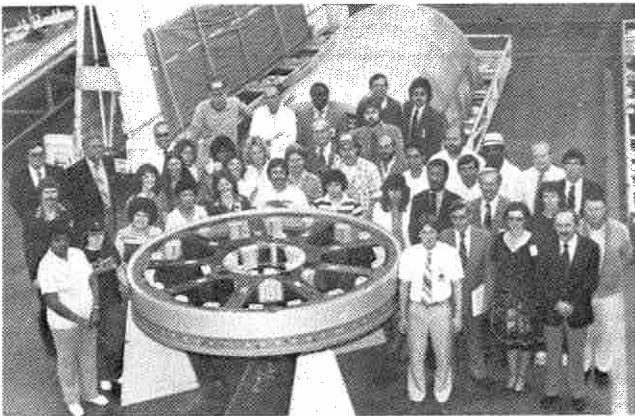
Spacecraft Maneuver Module Featured at AIAA Meeting

The 52nd Annual American Institute of Aeronautics and Astronautics Meeting and the 1983 Aerospace Engineering Show took place on May 10-12 in Long Beach. Convair's display at the meeting highlighted our broad range of space transportation capability, including Atlas/Centaur, Atlas IIB/Centaur, and Shuttle/Centaur.

The Spacecraft Maneuver Module was featured as the centerpiece of the display. The SMM on display was the actual prototype that went through a 100% successful

ground test firing program last fall at our Sycamore Canyon test facility and the Air Force Rocket Propulsion Laboratory at Edwards AFB. A structural testing program is the next step for the graphite composite structure.

Convair looks to a great future for the SMM. Its applications cover maneuvering of military satellites, transferring light payloads from low earth orbit to geosynchronous orbit, and using teleoperator devices to service satellites.



Pictured with the deliverable Peacekeeper CDM hardware are many of the people who have contributed to the success of this program.

Composite Deployment Module Structure Delivered

The thirteenth Peacekeeper (formerly MX) Composite Deployment Module structure built by Convair for AVCO Systems Division was completed April 14, 12 days ahead of schedule.

The deployment module is installed just forward of the missile's fourth stage and serves as a platform to support the reentry vehicle. Each module is 15 inches high, 92 inches in diameter, and weighs 265 pounds.



Apprentices to Journeymen. Capping four years of hard work, two apprentices have been awarded their journeyman certificates. Left: Jamie Box is congratulated by Bill Martin, chief of Tool Manufacturing. Box graduated as a jig and fixture builder-A. Right: Kirk Hunley is awarded his certificate by Fred Ketley, manager Manufacturing Planning. Hunley will be a tool and operations planner-senior in Department 431.

We are under contract to AVCO to provide 20 deployment modules for full-scale engineering development.

In addition, at AVCO's request we are preparing a proposal to define tasks and costs associated with the purchase of an additional 10 preproduction units. Go-ahead is expected in October 1983.

Savings and Stock Plan Values for March

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.5835	\$ 2.8632	\$ 3.4401
Diversified Portfolio	2.1869	1.9218	2.9224
Fixed Income	1.1850	1.3183	1.4725
Hourly			
Government Bonds	2.5811	2.8598	3.4375
Diversified Portfolio	2.2351	1.9617	2.9843
GD Stock	\$33.5000	\$24.1250	\$43.2500

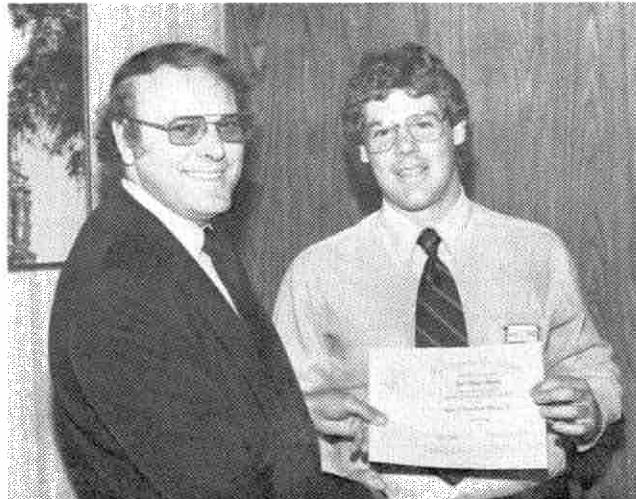
Make Stock and Savings Plan Changes Now

May is the month to make changes in your stock and savings plan or to enroll if you now have one year of service. The changes will become effective as of the first full paycheck in July. If you have one year of service with General Dynamics and have not been contacted by Employee Benefits, call KM 2559 to clarify your eligibility. This is especially important if you were hired during the last several months and have previous General Dynamics experience. Detailed plan information and enrollment and changes forms are available at Employee Benefits.

The purpose of the Weekly Log is to inform employees about Convair products and the accomplishments of people. You can help by contacting the Weekly Log coordinator if you have ideas for stories. Call Julie Andrews at KM 6966 or send written material to MZ 33-1334.

Employment

For the week ending May 6, employment was 9,526.



CONVAIR **Weekly Log** May 20, 1983

Published by the Convair Division of General Dynamics

Convair's Community Involvement Reaches Out to Area Small Businesses

General Dynamics Convair Division was recently recognized with a special award by the Greater San Diego Chamber of Commerce for our "Opportunities in San Diego" program. The program is set up to qualify local small businesses to bid competitively on our upcoming manufacturing requirements.

The Small Business Program, under the direction of Chuck Patmon, has been working during the last several months to find small firms with capabilities in machining, metal fabrication, electronic assembly, and fiberglass forming. Initially, the program contacted over 2,400 firms in Southern California. From those contacts, over 600 firms responded by attending Convair-sponsored workshops designed to explain our Procurement and Quality Assurance requirements. As a result of the workshops, the selection process is now under way to qualify 100 firms via on-site surveys.



Chuck Patmon, Small Business Program administrator proudly shows John McSweeny, general manager, the award Convair received.



Mark Neumann, Shelley Electronics, and Russ Babcock, Convair's director - Procurement.

Convair Presents 'Small Business of the Year' Award

As a part of Small Business Week activities in San Diego, General Dynamics Convair Division representatives attended a luncheon hosted by the San Diego Chamber of Commerce and the Small Business Administration on May 6. During the event, Russ Babcock, director - Procurement, presented the Convair Small Business of the Year Award to Mark Neumann, who accepted on behalf of Shelley Electronics. Convair recognized the outstanding support given our Purchasing and Research & Engineering departments by Shelley Electronics and their performance above and beyond the required duties of a distributor. The Chamber of Commerce luncheon is an annual event honoring nominations by major local contractors for Small Business of the Year.

Government Opens the Way for Commercial Atlas/Centaur

President Reagan announced a policy directive on May 16 that will allow commercial firms such as General Dynamics to sell expendable launch vehicles (ELVs) to other firms and to use existing government launch facilities. Under the previous policy, NASA bought and launched all Atlas/Centaurs for satellite users. The new policy will allow us to sell Atlas/Centaur space launch services directly to commercial satellite users and is in keeping with NASA's movement toward phasing out ELV business to concentrate on the Space Shuttle.

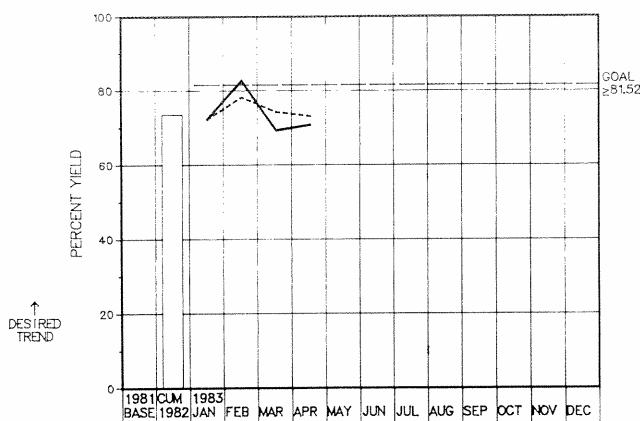
Although details of the policy have yet to be worked out, the president's statement opens the door for free

enterprise in space. In testimony before the House Subcommittee on Space Science and Applications on May 18, Bill Rector, vice president - Space Programs, stated General Dynamics' support for the new directive and our readiness to enter the commercial space business. Without this new commercial business, Atlas/Centaur production will end in 1985, with launches scheduled into 1987. If the commercial launch services market is as large as some experts project, extended Atlas/Centaur production will extend well into the 1990s and will result in several hundred million dollars of business for General Dynamics.

QIP Update: Test Yield Acceptance

First-time test yield is the percentage of first-time acceptable tests to the total number of first-time tests. Units that fail when presented for first-time acceptance adversely affect schedule and cost because of rework, scrap, retest, and reinspection. Therefore, the desired trend in the measurement is an upward trend. The QIP goal is to keep first-time yield at or above 81.52%. Our chart represents the first-time yield in the Tomahawk cruise missile assembly and final test area. We are presently at a cumulative average of 73.06% for the first four months of 1983, which is almost equal to the cumulative average from 1982 but below target for 1983.

Test Yield Acceptance Rates



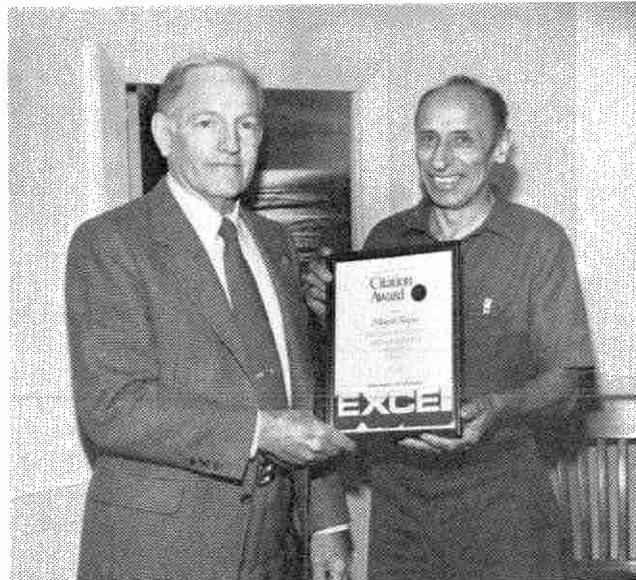
Cruise Missile Program Staff Hosts Visitors

Dr. Stanley B. Alterman, Undersecretary of Defense for Research and Engineering, and Col. Steve Moore and Capt. Dave MacClary from the Office of the Secretary of Defense visited our Kearny Mesa and Lindbergh Field facilities on May 16 and 17 for Cruise Missile program briefings. Mike Keel, division vice president and program director - Cruise Missiles, served as executive host for the meetings. The visitors were also given plant tours by Ed Squires and Jack Coffman.

Atlas/Centaur Launches Satellite

Atlas/Centaur 61 successfully launched the sixth of the current series of INTELSAT V International Telecommunications Satellites on May 19. These satellites are positioned in geostationary orbits and provide global telecommunication services. All Atlas/Centaur performance parameters and flight event times were well within expected dispersion values, and the spacecraft was injected into its proper transfer orbit.

This flight of AC-61 marks the last launch from Complex 36A and the last flight of an Atlas/Centaur of this particular configuration. Complex 36A will be modified for checkout of Shuttle/Centaur vehicles scheduled to fly on the Space Shuttle. The next flight of an Atlas/Centaur is scheduled for December 1983 from Complex 36B and will be a lengthened Atlas and a modified Centaur, both with increased performance. This increased performance will be used to launch the INTELSAT V-A series of satellites. The Atlas/Centaur program is under the direction of Marty Winkler.



Mike Reyna, a 42-year Convair veteran, was recently awarded an EXCEL Citation for being one of the top aircraft assemblers on the KC-10 line. George Williams, director-Aircraft Product Lines, made the award. According to Williams, Reyna "consistently sets high standards for quality and cost performance."

Company Picnic Set For Sunday, July 17

Convair Family Fun Day, our annual company picnic in Missile Park, will be held on Sunday, July 17. Sponsored jointly by the Convair Chapter of the National Management Association, CRA, and Operations Department, this event is for all Convair employees, families, and friends.

This year, Lou Imbimbo, manager of Operations at AF Plant 19, and Steve Woolley, manager of CRA Services, are picnic cochairmen, heading up a 17-member committee.

Grand prize in the special drawing this year will be a customized company van, updated with sporty paint job, picture windows, wide tires, mag wheels, and carpeted interior. A 35mm camera and a CB radio will also go to lucky ticket holders on picnic day.

Picnic-goers can bring their own food, but for those who don't, hot dogs, soft drinks, beer, popcorn, ice cream and other goodies will be sold. Flyers and posters will be out soon with more details about ticket sales for the drawing and other picnic events.

NMACC/CRA ANNUAL PICNIC 10a.m. to 5 p.m.

**CONVAIR
FAMILY
FUN - DAY**

Sunday, July 17, 1983

AT
MISSILE PARK, KEARNY MESA

Employment

For the week ending May 18, employment was 9,564.

CONVAIR Weekly Log

May 31, 1983

Published by the Convair Division of General Dynamics

Electronic Mail/Office Systems Eases the Paper Chase

General Dynamics is meeting the challenge of using computers to improve the productivity and effectiveness of its work place. A trial implementation of Electronic Mail/Office Systems (EM/OS) is under way at Convair and other divisions, and initial response has been enthusiastic, according to Judy Alden, EM/OS site manager.

What is EM/OS? It's a computer-based communications and information management system that incorporates personal video display work stations, a distributed minicomputer network, and flexible software. A key objective is to reduce paper and mail system delays.

How does it work? Through EM/OS, users have the advantage of instant communication with other users no matter what their schedule. This communication is available from any EM/OS terminal at any location in General Dynamics. It's like having your office with you.

Employees who have heavy report writing responsibilities need typing, filing, copying, mailing, delivery, and legibility capabilities to perform effectively. With EM/OS, report writers can create, revise, store, and exchange any kind of written information. They can exchange information with any user throughout the division and with nonusers by using a hard copy printout.

EM/OS can also schedule meetings, verify attendance, maintain followup listings, and format information through word processing.

At Convair. EM/OS began in July 1982 as a learning experience for the first eight users. Phase 2 began in September 1982 as a massive effort to train the next 130 users by the end of December 1982. The evaluation phase is now under way, and user comments (see side panel) indicate the positive response.

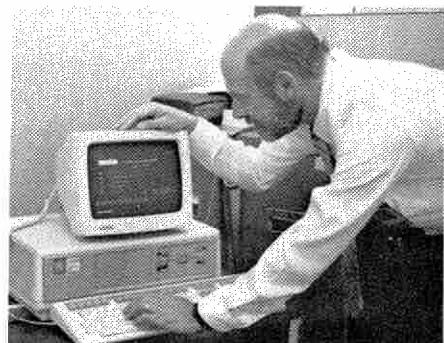
Next phase. At Convair, EM/OS is being implemented through the Finance Department under Greg Lucero, manager - Management Information Systems, and Judy Alden, who is responsible for office systems automation. Technical support is provided by Candice Shine and Jim Martin, Communication Services.

The next phase will be to expand the user base by identifying applications that demonstrate good use of the system. In July, the program will add an additional central processing unit to be shared with Electronics, DatagraphiX, and General Dynamics Services Company.

SES Provides Software Design Capability

The Software Engineering System (SES) is another computer resource implemented at several sites corporate-wide to help users do their jobs more effectively. SES provides tools for software development over a project's entire life cycle, from requirements and design through testing and documentation. One advantage of SES is that it provides an interim tool between the mainframe computers and the target microprocessors located in departments throughout the division.

Today, 29 Convair projects use SES. For example, the Midcourse Guidance Demonstration vehicle pro-



Vic Beattie, Management Information Systems: "EM/OS has become an effective ally in the work environment. Its ease of use, multiple approaches to problem-solving, and availability as an ever-ready tool have combined to clearly demonstrate to me its power for enhancing my personal productivity."

Other users:

Russ Babcock, Procurement: "It's a big step forward in effective communications."

George Roos, ILS: "Executive access improved beyond measure."

Karl Bruner, Finance: "The use of EM/OS for financial statements has provided us with two additional days for review prior to submittal and reduced costs."

Harry Wurtz, Contracts & Estimating: "Electronic mail has been useful in communicating with departmental personnel at remote locations."

Chuck Taylor, Plant Services: "EM/OS has given me the ability to better coordinate material and service activities while maintaining a documented record of the transactions."

Bill Bowersox, Facilities Planning: "Using EM/OS has enabled us to get our Capital Appropriation Request approvals two to three days faster."

gram used SES to design software in a systematic way so that each stage would be accountable to the customer. The Shuttle/Centaur program is using SES to test and develop the Z80 microprocessor software that will be incorporated into the Centaur stage. The Missile Procedures Trainer program is using design and documentation tools resident in the SES.

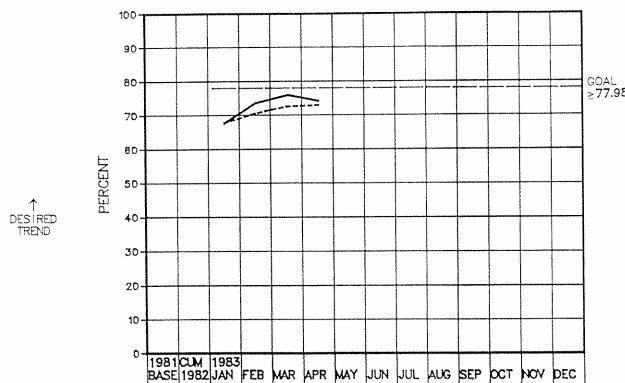
SES is available to all Convair, Electronics, and Western Center projects. For information about how SES can support project requirements, call Fred Peter, KM 1987.

QIP Update:

On-Time Deliveries of Production Requirements

This element measures the efficiency and timeliness of getting the required purchased materials from our vendor sources into the manufacturing process in our factory areas. Our Quality Improvement Program measurement is the number of material items received on time at the dock as a percentage of the number of manufacturing demands scheduled for delivery each month. The lower the percentage, the more costs are driven upward and schedule requirements not met. The QIP goal is to keep the percentage of on-time deliveries at or above 77.98%. The most recent data shows the percentage for April to be 72.99%. The cumulative average trend for the first four months of 1983 is favorable.

Percent of On-Time Delivery



Fifteen people, including future circle leaders and facilitators, completed the Quality Circle workshop on May 19 and 20.

More New Quality Circles

Five new Quality Circles have begun since the last report in the *Weekly Log*. People are putting their heads together to solve problems in Cruise Missile Avionics (two circles on the second shift), Engineering Management Services, Technical Publications, and Parts Release. Three more circles will be starting soon in Engineering Test Labs, Tool Services at LF, and Plant 19 TEL Assembly. Cruise Missile Avionics leads the way in number of circles with four.

In Convair's Quality Circle program, a supervisor of a work-related group receives leader training. The supervisor then gets the circle started and trains the members in problem-solving with the help of a facilitator. If you are interested in starting a circle in your area, see your supervisor. Supervisors, call Motivational Programs, KM 2256.

April Retirees

If you add up the years of experience represented by April's retirees, you get a grand total of 600. John Bogen tops the list with 45½ years of service to the company. That means he started back in 1937 when we were still part of Reuben H. Fleet's Consolidated Aircraft. For the newcomers among us, that was about the time the XPB2Y-1 (flying boat) was making her first flight and transoceanic airliners were just beginning to become a reality. Thanks and best wishes to all the retirees.

Name	Department	Years of Service
Philip L. Atkins	672-0 Engineering Specialist	38
James W. Ball	670-0 Senior Engineer	32½
Robert S. Bernstein	015-0 Jig-Borer-Machinist	13
John F. Bogen	041-0 Aircraft Assembler-S+SA	45½
Vincent F. Charder, Jr.	979-1 Launch Serv Tech-OSB	25
Ingeborg A. Cohn	810-3 Management Assistant	24
Robert G. Goldinger	345-0 Senior Quality Engineer	36½
William Hegebarth	439-0 Tool & Oper Planner-Sr	03½
Dean E. Hollenbeck	451-0 Form Tool Maker	25
Helen Hurdle	229-0 Packaging Design Analyst	26½
Charles M. Ipox	015-0 Duplicating & Profiling Machinist-Prod	23
Elmer E. Mattoon	979-6 Sr Launch Serv Tech-OSB	25
Harold H. Miller	242-0 Program Control Specialist	40
Ermal E. Raynor	001-0 Press Wrap Forming Mach	24
	Oper-Hvy Duty	
John P. Ruiz	047-0 Group Leader-LG6	42
Walter C. Scott	031-0 Mockup Mech Sys-E&E	32
Fredric N. Shepard	427-0 Engineering Specialist Manufacturing Engineer	40
Winston D. Strunk	015-0 Jig Borer-Machinist	24½
Jean A. Taylor	345-0 Group Leader-LG5	21
Lawrence D. Taylor	345-0 Quality Assurance	30
Robert J. Welsh	465-0 Senior Tool Designer	29

CPR Training

As the summer season approaches and residents as well as visitors flock to our recreational areas, San Diego generally experiences a sharp increase in life-threatening emergency situations and related life-saving or rescue attempts. Cardiopulmonary resuscitation (CPR) is a basic skill that has been proven to be a valuable life-saving technique when used by children or adults. Certification in CPR requires eight hours of instruction and practice. Our next class will be offered as a single session from 8:00 a.m. until 5:00 p.m., June 11, at the KM cafeteria and will be open to employees, families, and friends. A registration fee of \$5.00 per person, due before June 8, will confirm your registration. Upon completion, the \$5.00 can either be returned or donated to the American Heart Association. Please phone your reservation to the KM Fire Station (KM 1811) and mail your check, payable to the American Heart Association, to instructor Jack Boucher, MZ 50-1315. Refreshments will be provided courtesy of NMACC.

Employment

For the week ending May 20, employment was 9,598.

CONVAIR Weekly Log June 6, 1983

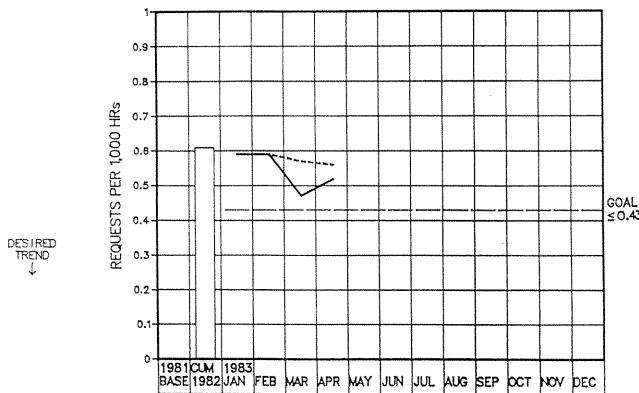
Published by the Convair Division of General Dynamics

Quality Awareness

Quality Improvement Program (QIP) Update: Engineering Changes

In an effort to measure and improve the quality of product design, the number of avoidable engineering change requests is being tracked. Avoidable changes (AC) are those changes due to some inadequacy or fault in the engineering release package; i.e., changes required to make the product work or make it producible on the manufacturing floor. The QIP measurement is the number of avoidable drawing change requests per 1,000 design engineering hours. This month's ratio is 0.52. The year-to-date cumulative average of 0.56 reflects the favorable trend toward the goal of 0.43.

Drawing Change Requests per 1,000 Engineering Hours



TOMAHAWK FLIGHT BULLETIN

Land-attack missile T102:1 was successfully launched from the USS *La Jolla*, submerged off the coast of California on Friday, June 3. The missile flew a mission of over 2 hours duration to the Utah Test Range where it overflew a simulated target and was then successfully recovered. This was the last development flight test of the submarine-launched, land-attack missile prior to entering full operational evaluation later this month.



Front row: (l to r) C. Vance, P. Cabaguing, M. Guardado, and W.B. Pamintaun. Second row: Lou Imbimbo, T. Grubacki (general supervisor), S. Bazile (group leader), E. Fontenot, C. McJunkins, A. Todd, and M. Mixon. Back row: R. Brodbeck (supervisor), J. Potts (supervisor), and Al Damarus (maintenance chief).

Making a Difference

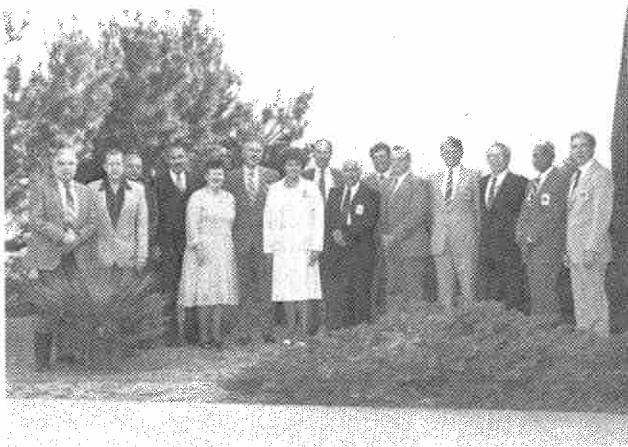
Tomahawk Deliveries Continue at High Rate In May
 Ten more Tomahawks were completed and delivered during May. Six were production GLCM vehicles for the first main operating base in Europe. This delivery puts us two ahead of the GLCM contract requirement. Two conventional land-attack missiles, one for ship launch and the other for sub launch, were also included in the May deliveries. The final two vehicles were land-attack nuclear vehicles for the flight test program. One is currently aboard the USS *La Jolla*, and the other is stored for load-out and flight test later this month. In addition to these vehicles, GLCM test vehicle T75:2 completed a recertification activity and was delivered to the Utah Test and Training Range for an upcoming flight test.

EXCEL Awards

EXCEL award recipients of Plant 19 custodial services, receive congratulations from their supervisors. Lou Imbimbo, Operations manager Plant 19, made the award. According to Imbimbo, "This group's continued outstanding performance reflects the pride in their work and exemplary motivation."

Savings and Stock Plan Values for April

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.5671	\$ 2.9173	\$ 3.5110
Diversified Portfolio	2.1570	2.0116	3.1392
Fixed Income	1.1954	1.3292	1.4862
Hourly			
Government Bonds	2.5647	2.9171	3.5090
Diversified Portfolio	2.2049	2.0431	3.2074
GD Stock	\$34.0000	\$28.6481	\$50.3750



Service Award Breakfast

On May 20, a breakfast was held honoring Convair employees who completed 35, 40, or 45 years of service. Pictured from left to right: "Nacho" Baracamontes (40), Verril Martin (40), Frank Silvas (35), James Sproat (40), Golda Houk (35), John McSweeny (general manager), Chique Stieringer (35), Donald Lauder (35), Joe Butera (40), Art Veitch (Contracts & Estimating), William Brown (35), Ken Lake (Operations), Jack Collins (35), Henry Hyman (Engineering), and Ken Malberg (Quality Assurance).



Chuck Engebretson's Production Control people have done an outstanding job of cruise missile parts protection in KM Stockroom 58. According to the Industrial Engineering Material Engineering Group, KM Stockroom 58 is "the best-looking stockroom in Convair." Material handling inspections conducted by first-line supervisors, Quality Assurance, and Production Control seldom turn up problems in this area. The people of Stockroom 58 are (left to right): Mike Hanold, Shirell Harris, Penny Vining, Annalisa Ray, Carla Sauceda, Wayne Mathe, and Chuck Engebretson.

Notes About Convair People

Three papers are being presented by C.L. Carpenter, D.J. Clemens, and T.J. Phillip of Quality Assurance at the 1983 Mission Assurance Conference and Workshop, jointly sponsored by NASA, Air Force Space Division, NSIA, and AIA, at the Hyatt House-Los Angeles on June 7, 8, and 9. This third conference continues the 1978 and 1980 sessions between government and industry representatives to improve the space acquisition process.

Need-To-Know

General Dynamics Corporation is planning, testing, and manufacturing some of this country's most advanced land, sea, and air weapons. The natural curiosity of employees and their desire to be "in-the-know" must be curbed to maintain a need-to-know principle. Information does not need to be secret to be of value to foreign intelligence services or other corporations. General Dynamics private information must be controlled and a strict need-to-know enforced. As business becomes more competitive, success will be directly related to confidence in a company's reputation for responsible information control. Do not discuss programs with others unless they have a clear need-to-know. Do not ask about programs unless you have a need-to-know.

Housekeeping — It's Everyone's Job

Even though housekeeping is an individual responsibility, there may be times when you need special assistance. If you see a housekeeping problem that you cannot handle yourself, please help by reporting it to your plant coordinator.

KM & Sycamore

Plant 19

Lindbergh Field

Harbor Drive

Chuck Simmons

Al Skiles

Jim Macoubrey

Al Damarus

KM 1231

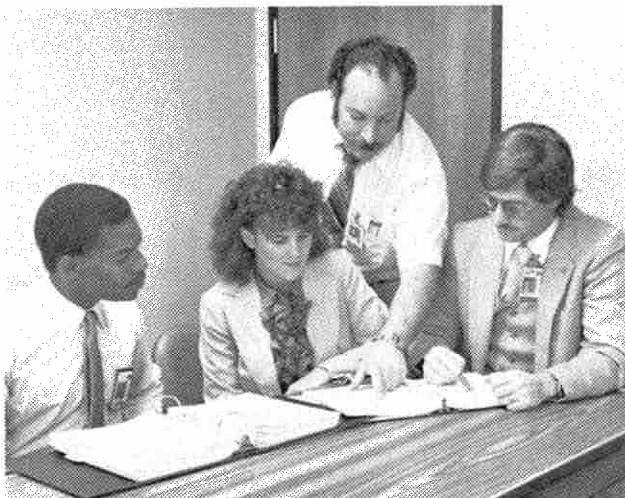
LF 8585

LF 8023

LF 8215

Employment

For the week ending May 27, employment was 9,665.



Keith Manning, Jan Lundy, Eric Sillman (standing) and Steve Cuba (l to r) add some finishing touches for their Technical Writing seminar.

Technical Writing Classes Held at Morse High School

In an ongoing effort to bring industry and education closer together, Technical Publications of Integrated Logistic Support recently held six technical writing classes at Morse High School. The instructors for this program were Steve Cuba and Jan Lundy, with some special assistance from Eric Sillman. Classes covered many different aspects of creating a technical manual, with emphasis on the importance of good writing skills. A highlight of these classes was the discussion on careers in technical writing.

CONVAIR Weekly Log

June 13, 1983

Published by the Convair Division of General Dynamics

Computer-Aided Design/Computer-Aided Manufacture: Helping Convair Achieve Quality Goals

What is CAD/CAM? At Convair it is computers — IBM, Cyber, Computervision, and VAX — which make possible an engineering-to-manufacturing data flow. It is programs, hardware, software, plotters, enhancements, and — most important — the people who make computers work effectively for them. This article focuses on the design applications of CAD/CAM. Next week we will look at the manufacturing capabilities.

How does computer-aided design work? The geometric description of a product is the common language used in our design and manufacturing process. As a design advances from concept to manufacture, the geometrical description is refined, and much detail is added. It is this geometry, and the human visualization of it, that enables the shape of the part to be communicated from designer to manufacturer. This is why drawings have always been the focal point of a manufacturing firm like Convair. Computer graphics systems — Computervision, for example — allow a designer to create geometry faster than with pencil and paper. The design data created is stored in a computer-readable form for access and use for other functions. User groups do not have to redraw or reinterpret the geometry to do their tasks, thus eliminating data transcription errors and shortening schedules. A centralized data repository, easily accessible by groups using computerized aids, is the main concept of CAD/CAM.

What is the state of the art in CAD/CAM at Convair? The *Weekly Log* went to Gene Perkins, Research & Development; his group recently completed a long-range plan for CAD/CAM that outlines where we stand and where we are going. According to Perkins, the system has evolved rapidly, due in part to rapid improvements in hardware and software. Computers have been used by analytical functions at Convair for many years, but interactive graphics, in the form of Computervision, first began in 1976.

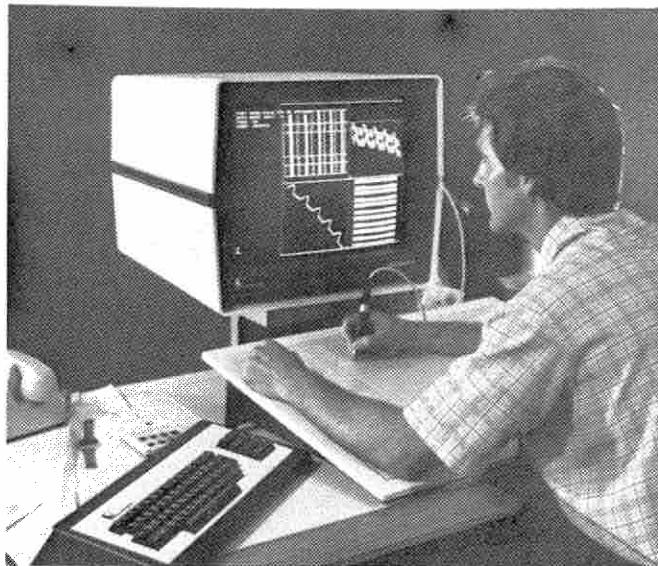
Today, the Avionics people at Convair use the CAD/CAM system to design multilayer printed-circuit boards that are so dense they probably could not be made by hand. Another large user is the Shuttle/Centaur program. A great majority of the program's structural and mechanical work is being done by computer. Eventually, all facilities planning will be done on the computer; for example, the floor plans of the new engineering building were designed on Computervision. In the future, use of microcomputers, like the Apple, in project and functional areas will greatly expand the user base.

The introduction of these kinds of time-saving technological advancements is the key to winning more programs by competitively designing and manufacturing high quality products.

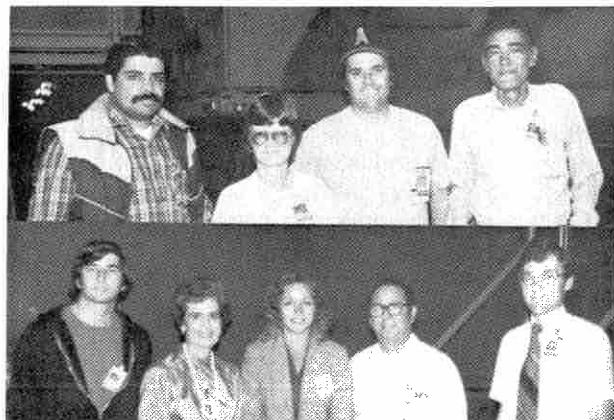
GLCM Flies Successful Mission on June 7

The launch of T75:2 was a complete success. The missile flew for nearly two hours and was recovered. All mission objectives were accomplished.

In recognition of their outstanding work on GLCM missile, TEL, and LCC production, a group of Convair employees traveled to the Dugway (Utah) Proving Grounds last week to watch the latest GLCM launch. The group toured the launch site, inspected the TEL and LCC, and got a first-hand look at an actual missile launch. Pictured from left to right are: (top) Armando Lerma, Cathy Turner, Lou Meadors, Ed Esquibel; (bottom) Ron Stokes, Delores Hostetler, Trish Shurko, Irv Cooperman, Dick Schauer.



Ken Mudrak, design engineer in Mechanical and Fluid Design, looks at a section of the latest composite support stringers for the Centaur aft deployment adapters. The computer provides a three-dimensional model including four views: top, front, side, and isometric.



FLIP

Important Notice from the Employee Benefits Department

For those employees who are contemplating retirement, it is extremely important that you notify the Employee Benefits Department, KM 2267, at least two months before your termination date. This advance notice will allow us to process your request in sufficient time so that your first check reaches you promptly after your retirement.

Employee Suggestion Program Sets New Goals

The employee suggestion plan was first organized at Convair in 1942. Since then, thousands of employees have received cash and merchandise awards for their good ideas. In 1982, for example, the total employees received from suggestion awards was \$111,421.

In expediting suggestions, analysts face a huge administrative task. Last year over 4,000 suggestions were processed; and the projection for 1983 is that 6,000 suggestions will be submitted. Each suggestion must be read before being channeled to the appropriate people in departments throughout Convair for evaluation. To ease the paperwork burden, the program is now being streamlined so that we can share the benefits of everyone's good ideas sooner.

Employee Suggestions has recently moved to Motivational Programs in Industrial Relations. Bruce Marshall, supervisor of Motivational Programs, says, "For a program to be effective, people have to see results now. Our group is committed to reduce the backlog and process suggestions."

For information, call Employee Suggestions at KM 3908, or send your suggestions to MZ 33-1334.



RETC Program Helps Area Employment

Convair is participating in a program that provides good, trained people for our workforce. The program is a cooperative effort between government and industry that uses the Regional Employment Training Consortium (RETC) to provide candidates from the ranks of the unemployed or underemployed. After candidates are interviewed by Convair, a number of people are selected to receive classroom and on-the-job training. Since the beginning of 1982, four groups of workers have been trained, including the most recent group in T&O Planning (photo above). According to Hugh Souder and Robert Rix of the Technical Training Department, some of our top trainees have come from the RETC supported program.

Convair Visitors

Vice Adm. Lee Baggett, Jr., USN, Director of Naval Warfare, visited Convair on June 6 for Tomahawk cruise missile briefings. Mike Keel was host and guided Adm. Baggett through the cruise missile final assembly area. On June 6 to 9, Ms. Ruth McIlwain, Ms. Aletha Brown, and Mr. Horace Kreitzman of the Government Accounting Office, Washington, D.C., visited Convair for briefings on cruise missile production readiness. They also toured the KM and LF factories and the Sycamore Canyon facilities.

Inplant Training for T&O Planning Offered

To meet the company's need for planners, Convair is offering all qualified employees the opportunity to apply for an implant course on Tool and Operations Planning. Instruction will consist of classes held during work hours (forty hours per week for six weeks), followed by 16 weeks of on-the-job training. Interested applicants must attend one of the briefings listed below. Details on the qualifications needed will be covered and applications will be taken for the program.

Second Shift Employees	Date	Time
LF building 14 auditorium	June 14	2:00-3:30 p.m.
KM main dining room	June 15	2:00-3:30 p.m.
First Shift Employees		
LF building 14 auditorium	June 14	3:45-5:15 p.m.
KM main dining room	June 15	3:45-5:15 p.m.
Third Shift Employees		
KM main dining room	June 16	7:30-9:00 a.m.

For further information, call Robert Rix, Educational Services, at KM 2236.

People Notes

The 42nd International Convention of the Society of Allied Weight Engineers took place in Anaheim from May 21 through 25. Paul Slysh, a senior software engineer at DSD-Western Center, co-chaired the technical session. Bob Johnston, manager - Engineering Cost Analysis, chaired the cost analysis session. In addition, six Convair people presented papers at various sessions of the convention: Quentin Redman and Ted Parsons, Contracts & Estimating; and Jeweline Richardson, Jack Stahl, John Naki, and Arthur Prast, senior weight engineers. SAWE is a 1,400-member society that encompasses many engineering disciplines.

Drawing Tickets Now on Sale

Company Picnic Set for Sunday, July 17

Convair Family Fun Day, our annual company picnic in Missile Park, will be held on Sunday, July 17. Sponsored jointly by the Convair Chapter of the National Management Association, CRA, and Operations, this event is for all Convair employees, families, and friends.

The grand prize of the special drawing this year will be a customized van. A 35mm camera and 40-channel CB radio will also go to lucky ticket holders on picnic day. As of today, tickets are available for the prize drawings for a donation of \$1 each. You can pick up as many tickets as you wish. Watch for flyers in your area detailing the many locations where tickets are available.

Employment

For the week ending June 3, employment was 9,706.

CONVAIR Weekly Log

June 20, 1983

Published by the Convair Division of General Dynamics

CAD/CAM: Helping Convair Achieve Quality Goals

The last issue of the *Weekly Log* highlighted computer-aided design developments at Convair. This article outlines the growing capabilities of computer-aided manufacturing. According to Jim Dooley, Manufacturing Systems Engineering, the integration of CAD and CAM rests on an important concept: capturing information at the point where it is generated, and organizing and storing the information for retrieval downstream when needed. As a part of this effort, many computer systems are in place and being used.

Interactive Graphics. Two Computervision systems with nine terminals are now in use at Lindbergh Field by NC Programming and Tool Design. In 1982, we developed and demonstrated a computer graphics 5-axis NC programming capability. The software is now being installed and tested on the production system and is expected to be fully operational in August. Simulation techniques for NC part program verification have been developed and are used routinely to save time and cost on proofing tasks.

DNC/CNC Network and Management Information System (MIS). This major computer communications network has been developed over the last four years.

Hardware has been installed and checked out, software has been developed and tested, and 12 machine tools are now connected to the system. The system is being used by Factory and Plant Services to report failures or problems such as a machine breakdown. Problems are then telephoned to Maintenance Dispatch, where the information is stored in the computer, and the status of all machines can be displayed at all computer terminal locations at any time.

Robotic Systems. Manufacturing Technology has developed a multitask robotic work station that is being installed this summer to do selected sheet metal routing tasks in Department 001. Other robotic stations are being developed for selected electronics assembly tasks and automatic x-ray inspection of cruise missile body section welds.

Paperless Avionics Work Instructions (PAWI). A system has been developed that will display work instructions with graphics illustrations on a computer screen. The PAWI system has been designed to lead an operator step-by-step through the sequence of operations necessary to produce an assembly. The first work station has been installed and efforts are under way to develop the data files for all assemblies.

Other CAM Programs in Development Include:

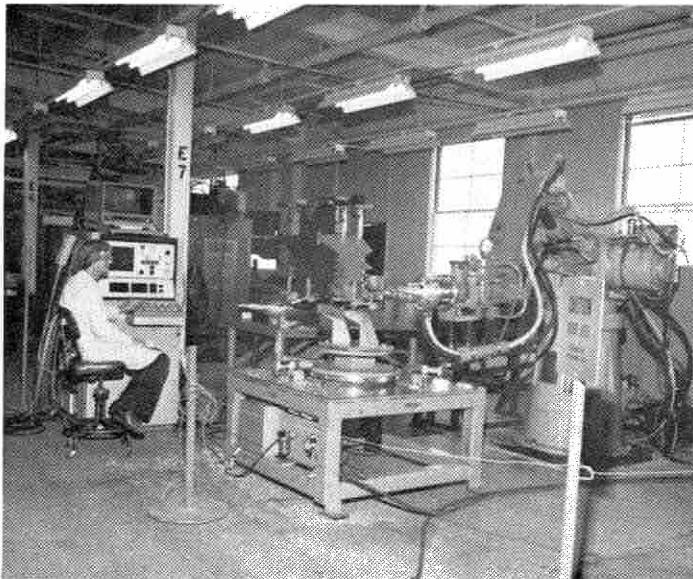
- Master/Dimension System interface to NC programming and Computervision systems.
- An advanced process planning system that will incorporate group technology capabilities.
- A simulation model to perform load-capacity analyses.
- A solid geometric modeler to improve the NC part program verification system.
- Cruise missile final assembly paperless operations.

Computer-aided manufacturing technology is being developed at all General Dynamics divisions. A project team led by DSD-Western Center is working to develop a CAD/CAM database management system for long-range applications throughout the corporation. The related database tools they are working with will provide very powerful data management and distribution capabilities when they mature.

Atlas/Centaur Started Pioneer 10 on Its Journey

On Monday morning, June 13, 1983, at 5 a.m. PDT, Pioneer 10 became the first man-made object to leave our solar system and begin a timeless journey through interstellar space. Atlas/Centaur 27 boosted this small spacecraft from Launch Complex 36A at Cape Canaveral and into its interplanetary trajectory on March 2, 1972.

In the 11 years since that historic launch, 32 other Atlas/Centaur have placed 24 communications satel-



Tom Sallwasser, manufacturing engineer, is programming the robot to perform routing tasks on a cruise missile part in Department 001 at Lindbergh Field.

lites into geostationary orbit and eight scientific space-craft into earth-orbit or interplanetary trajectories.

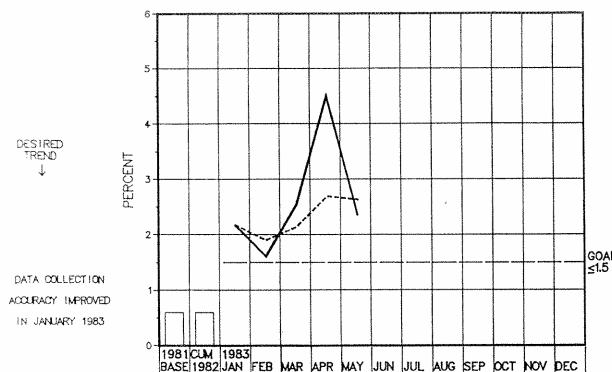
Atlas/Centaur is scheduled to launch four more **INTELSAT VA** and three **FLTSATCOM** satellites. According to Doug Heydon, director-Space Marketing, sales activity with **INTELSAT** and other commercial customers is expected to result in continued deliveries of these reliable vehicles well into the 1990s.

Quality Awareness

QIP Update: Rework and Repair

Rework/repair is the labor required to correct a nonconformance identified on an inspection rejection document. The controlling documents for rework/repair accounting are the Quality Assurance Report (QAR) and the Quality Completion Order (QCO). The measurement is the actual hours spent on rework/repair as a percentage of the total actual manufacturing direct labor hours expended monthly. The 1983 goal is to keep the hours spent on rework/repair to under 1.5% of the total hours. The accumulated year-to-date average for the first six months of 1983 shows an unfavorable trend.

Rework and Repair



Making a Difference

New Dialing Instructions to Reach Electronics Division from Convair

Effective June 20, part of Electronics Division will be serviced by a new telephone system called System 85. The change affects employees located in all of building 70 and part of building 33 at Kearny Mesa. All System 85 users will have new numbers, so you will have to call information to get the new numbers or to determine whether the party you are calling is on the new system. To reach the Electronics Division directory information operator from Convair:

KM: Dial 87 + 0
LF: Dial 101 + 0

To dial System 85 users from Convair:

KM: Dial 87 + extension
LF: Dial 101 + extension

To reach the Electronics Division from outside the plant, call (619) 573-6111.

EXCEL Award to Configuration Management Instructors

Sixteen employees were recently honored with EXCEL awards for their outstanding efforts in setting up a comprehensive configuration management (CM) training program at Convair. Gerry Smith, manager of Configuration Management, presented awards to instructors Bob Blumling, Chuck Gilbreth, George Shumway, Dave Longwell, Betty Upton, Al Ruark, Marsha Hungerford, Bill Linder, Bill Maffucci, Millie Gallaher,

Bill Olson, Jeff Frelinger, Jim McAllister, John Collins, Mort Sherman, and Tom Samaras. In addition to their regular duties, the group developed the 16-hour course and presented it to employees from Engineering, Integrated Logistic Support, Quality Assurance, and Operations. 200 people have now been trained and the CM group anticipates 250 more people will complete the program before the end of the year.

Configuration Management is a systems management discipline that helps employees identify the physical and performance features of a product and develop sensitivity to problems caused by product change. It coordinates the frequent and complex configuration changes among the various specialists, departments, and the customer. Ultimately, CM helps control costs, maintain delivery schedules, and ensures that the customer will receive an accurate description of the product.

If you need to understand the requirements of CM in your job, ask your supervisor to contact Tom Samaras (KM 2492, MZ 34-6060) to reserve space in the next class.



Dr. John Barrons, manager of Educational Services and Equal Employment Opportunity, congratulates Carole Black on her TWIN award.

Carole Black, Recipient of TWIN Award

Carole Black, engineering forecast and task planning chief, was recently honored at a Tribute to Women in Industry (TWIN) luncheon sponsored by the YWCA of San Diego County. She was recognized, along with 72 other women and their employers, for their excellence in management, executive, or professional roles. A follow-on career options program involves the honorees as role models in career guidance counseling for young women at local high schools.

Carole has been with Convair for 30 years and directs the activities of 35 people, ensuring that the engineering, planning, and cost control of major programs are maintained. She has primary responsibility for providing cost data on a regular basis for work completed and projecting cost-to-complete data on major missile, space, and energy programs.

Employment

For the week ending June 10, employment was 9,754.

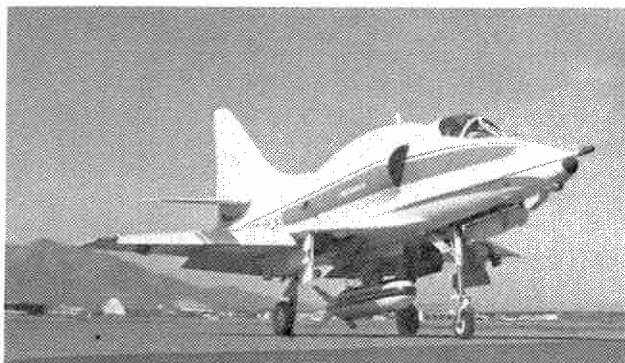
CONVAIR Weekly Log

June 27, 1983

Published by the Convair Division of General Dynamics



Congressman Robert E. Badham (R-Calif.), member of the House Armed Services Committee, visited Convair on June 17 for cruise missile briefings. Pictured from left are Howard Seelye, aide to the Congressman, Ed Squires, Bob Cook, and Congressman Badham as they tour the Tomahawk Final Assembly area.



MRASM: Milestones Achieved

A prototype submunition dispenser, installed on the centerline station of an A-4D (photo, above), successfully ejected eight submunitions in two controlled patterns at Mojave, California on June 2. A second demonstration took place on June 9, at the Naval Weapons Center Range where fourteen submunitions were ejected during two passes over the target. Twelve submunitions were ejected during the second pass in a volley for a successful cross-axis runway attack pattern.

The Critical Design Review of the FSED submunition dispenser was conducted by Air Force and JCMP personnel on June 14 and 15. Hardware used during the prototype flight test was on exhibit. This was the final JCMP formal review of the MRASM air vehicle design before production of the missiles to be used in the flight tests from B-52G aircraft.

To Convair Employees:

Congratulations! As of June 21, DCAS lifted three of the four remaining Method C items involving Planning, Corrective Action, and Material Handling. This follows the lifting last January of the first Method C correction action request and leaves one remaining item — Nonconforming Material — to be resolved. I am confident that our continued dedicated efforts will resolve this final item to the satisfaction of our customer.

Our division faces significant challenges and opportunities in the future. By continuing to build on the positive attitudes and teamwork that have seen us through the difficulties of the past year, we will successfully meet the rest of our production goals and strengthen our position to produce quality products, on time and at cost.

Thanks to each and every one of you; we must keep up the good work.

John McSweeney
Vice President and
General Manager

Convair-Built Mid-Fuselage Part of 'Challenger'

The second launch of the space shuttle *Challenger* from Kennedy Space Center on June 18 went very smoothly. Liftoff occurred as scheduled at 7:33 EST into a slightly overcast sky. The flight was a spectacular success ending with the landing at Edwards AFB on June 24.

The *Challenger*, the second flight shuttle orbiter, includes the third mid-fuselage built by Convair. OV-104, the fourth mid-fuselage, is in final assembly at the Rockwell Palmdale plant as part of the *Atlantis*. Work on the fifth mid-fuselage, a spare unit, is just beginning.

Convair was represented at the launch by Bill Rector, division vice president — Space Programs, Lloyd Munson, manager — Orbiter Mid-Fuselage Program, and Doug Heydon, director — Space Marketing.

Expanded 'Educational Bulletin' Available in July

An expanded *Educational Bulletin* is being published by Educational Services to inform all employees about lifelong learning opportunities in our workplace. The monthly bulletin will contain a schedule of technical and management training, stories about individual educational programs, and a section detailing the many workshops and seminars sponsored by the NMA Convair Chapter. The July issue will be available this week at selected plant gates and at the Educational Services Offices, KM building 17 and LF building 16.

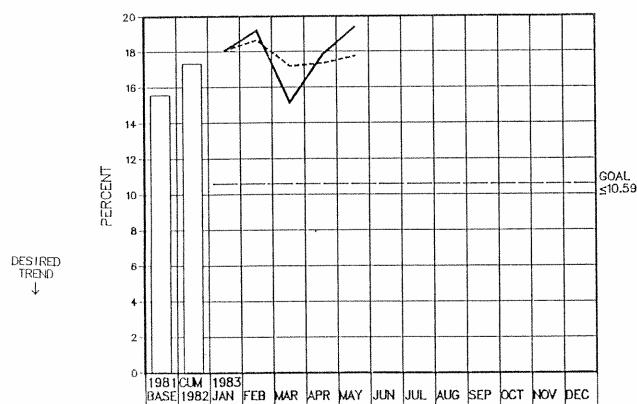
FLIP

Quality Awareness

QIP Update: Inspection Escapes

The accuracy of visual/dimensional inspection is critical to ensure that nonconforming hardware is detected at the point of origin. Nonconformances processed to other departments represent added cost and indicate inefficiencies in the inspection process. The measurement determines the number of out-of-department QARs (prior department responsibility) originated as a percentage of the total number of QARs originated on a monthly basis. The QIP goal is to keep inspection escapes at or below 10.59%. The most recent data shows the May percentage to be 17.75%. The cumulative average trend for the first five months is unfavorable.

Inspection Escapes



Making a Difference

These People Retired in May

Convair's thanks and best wishes to each of these employees who retired in May, 1983.

Name	Department/Title	Years of Service
R. Scarlett Alderman	104-2 Secretary	33
Frank L. Biscak	232-0 Manufacturing dispatcher	42
Virgil C. Breit	049-0 Operations supervisor	43
Thaddeus Bronikowski	400-1 Sr T&O planner	32½
Robert E. Brown	431-0 Sr T&O planner	42
Robert L. Brown, Jr.	761-0 Elec missile mechanic	35
Ralph F. Bucy	253-3 Painter-maintenance	28
Morgan B. Eilert, Jr.	666-0 Sr engineer	30½
Jose G. Gonzalez	225-1 Operations general svpr	36½
Frank M. Grant, Jr.	454-0 Operations supervisor	42½
Charles W. Greenlee	753-0 Plaster pattern maker	27
John J. Jodka	193-0 Chief-finance	30
Gabriel R. Kirkeby	451-0 Jig & fixture builder	22
George D. Kline, Jr.	350-0 Inspector-msl final assy	41½
Frederick N. Minter	190-0 Manager-govt regs	43
Jack A. Riegert	311-0 Quality-project admin	17
Frank D. Robbins	190-0 Director-mfg control	29
Joe C. Sanchez	253-3 General utility worker	32
Clarence L. Smith	431-0 Tooling specialist	39
Evelyn C. Smithson	192-0 Sr design engineer	24
John J. Strachan	673-0 Sr engineer	32
Ora S. Williams	561-0 Sr mgmt statistician	27
Gerald F. Wilson	343-0 Insp-precision parts	27



T.K. Jones (right), Undersecretary of Defense — Research & Engineering, visited the KM and LF plants on June 16. Pictured with him are John McSweeny, Dave Cormany, Stan Bass, and Al Nelson, during a plant tour.

Teamwork Produces Significant Savings on TEL/LCC

Method improvements recently have been successfully implemented on all sides of the Aft Equipment Box on the GLCM TEL/LCC. These improvements have resulted in labor savings of more than 100 hours per unit. Employees from Manufacturing Technology, Planning, Tool Control, Tool Design, Tool Manufacturing, Transportation, Inspection, and Production departments all had a part in implementing these improvements — a real team effort.



Front row: (l to r) Carlos Velasquez, Dave Carlson, Brad Philpot, Roger Shoemaker, Kurt Newman, and Bill Yanki. Back row: Mike Pettigrew, Doug Dupras, Tim Ellis, Robert Rolla, Jim Crosby, Tony Medina, James Nickless, Bob Whalin, Ron Carlson, Rick Dugan, Steve Sedlak, and Mike Capossere.

NMACC/CRA ANNUAL PICNIC 10a.m. to 5 p.m.
**CONVAIR
FAMILY
FUN - DAY**
 Sunday, July 17, 1983
 AT
 MISSILE PARK, KEARNY MESA

Employment

For the week ending June 24, employment was 9,832.

CONVAIR Weekly Log

July 5, 1983

Published by the Convair Division of General Dynamics

Value Engineering Workshop

The second value engineering workshop of 1983 came to a close Friday, June 24, when eight project teams made presentations on the projects they had worked on during the two week session. The project teams of five to six employees were assigned projects from the GLCM/LCC, Cruise Missile, Centaur, and Atlas programs. The presentations were introduced by Everett Lindem, retired Convair technical training specialist, who taught the workshop. He was helped by four project leaders: Sue Addy, Bill Frank, Frank Heitman, and Herb Bickley of DCAS.

Division General Manager John McSweeny made the keynote remarks at the start of the workshop, and Pete Caswell, chief of the Systems and Engineering Branch of DCAS, led off the second week. At the graduation ceremonies, Bruno Bracka, director of Structures and Design, presented certificates. Bracka received a surprise presentation from Lindem — the original flip charts from the presentation Bracka's team made in the Value Engineering workshop he attended back in 1968.

Value Engineering is a set of techniques designed for systematic removal of costs that do not contribute to the value of a product. It begins by establishing a functional definition of the part considered. Instead of asking how to make the part less expensive, the value engineer asks what function is required, what is that function really worth, what are the alternatives, and how many ways can the function be provided. He or she then asks what are the costs needed to arrive at a choice offering the most value.

The value of the workshop is practical. Students take the techniques they learn back to their work areas, and at the same time, some of the actual projects from the workshop will be written up as Value Engineering Change Proposals to be submitted to Configuration Management for possible implementation.

How much of an impact can value engineering make? It was estimated that the net savings from the eight project team proposals was over \$19 million, representing a 38% saving.

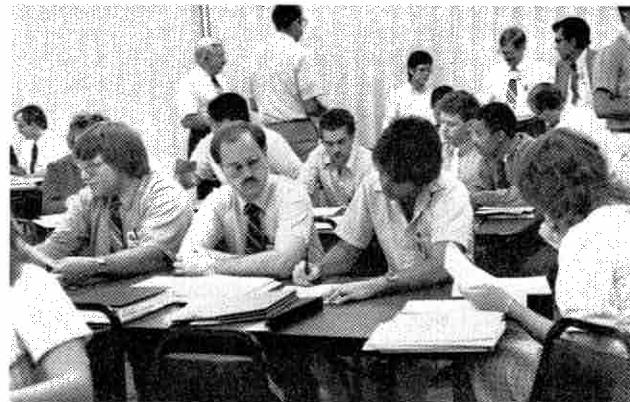
Savings and Stock Plan Values for May

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.6052	\$ 2.9671	\$ 3.4923
Diversified Portfolio	2.1840	1.9268	3.1051
Fixed Income	1.2058	1.3413	1.5006
Hourly			
Government Bonds	2.6026	2.9643	3.4906
Diversified Portfolio	2.2316	1.9665	3.2495
GD Stock	\$32.0000	\$25.7500	\$52.3750

KM Colocation on Schedule

The Kearny Mesa plant rearrangements are progressing as scheduled. The enhancements will collocate the Cruise Missile and Space programs, consolidate core functional departments, and refurbish existing office areas.

Cruise Missile Colocation. Construction of the new mezzanine area within KM building 5 is scheduled for completion by July 30. Cruise missile support personnel will begin a six-week transition period in August. Restrooms in the building 5 construction area are to be refurbished as well.



Value Engineering students at work.



The Value Engineering graduates and leaders.

Space Program Colocation. During the past ten weeks, about 850 people were affected by rearrangements because of the colocation of space programs in KM building 26. The colocation of personnel supporting the Atlas, Atlas/Centaur, and Shuttle/Centaur space programs was finished on June 18. During the rearrangement, building interior was refurbished with new paint, carpeting, and partitions.

Research & Engineering. Construction of the Research & Engineering facility, KM building 25, is in its final phase. The interior and exterior finish work and landscaping is almost complete. Office interiors, designed with a modern, open office environment concept, are planned for the new facility. Core engineering and other departments will move in during August.

Office Refurbishment. Plans are being developed to continue to upgrade other office areas in late 1983 and early 1984. These upgrades are designed to improve working environments by providing better noise control, ventilation, lighting, and the opportunity for better housekeeping. Next week we will update the activities at Lindbergh Field.

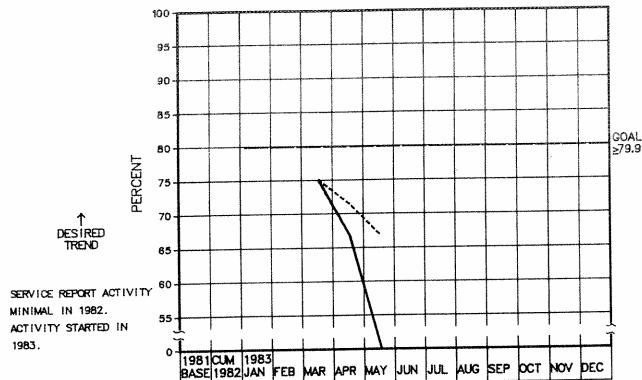
Quality Awareness

QIP Update:

Service Report (MIP) Response Time

Early resolution of field problems provides for improved customer relations and demonstrates effective support of the product. The QIP measurement technique determines the percentage of problem reports answered on time, and plots that data monthly. Service report activity was minimal in 1982, and the 1983 activity is not sufficient to determine a definite trend.

Service Report (MIP) Response Time



Making a Difference

Tomahawk T49 On Target

Antiship missile flight testing resumed on Monday, June 27, with the successful flight of Tomahawk T49. The missile was launched from the USS *La Jolla*, while submerged and under way, in the area of San Nicholas Island. The 12-minute flight culminated with a successful attack and direct hit on a target hulk. The flight of T49 was the first of four flight tests designed to verify the operational capability of the submarine-launched antiship missile. Other missiles for this program, T47, T44, and T119, are in final assembly and checkout, and being readied for flights in July and August.

Family Fun Day Only Two Weeks Away

A familiar sight around Convair facilities is the 1978 Ford Super Van, with its metallic blue finish and sporty stripes, being inspected by prospective owners. This vehicle, the special drawing grand prize for Convair Family Fun Day, comes with picture windows, chrome wheels, wide tires, a ceiling vent, and paneled and carpeted interior. The van is being displayed at facility gates on a rotating schedule. Volunteer crews are on hand to dispense the \$1 donation tickets between the hours of 6:30 to 7:30 a.m., 11:00 a.m. to 12:30 p.m., and 3:30 to 4:30 p.m. every work day until the picnic on Sunday, July 17. You can pick up as many tickets as you wish.

On the day of the picnic, hot dogs, soft drinks, beer, popcorn, and ice cream will be on sale. You can also bring your own picnic lunch.

New Employee Orientation

The next New Employee Orientation will be held in building 5, mockup room A, at Kearny Mesa on Monday, July 11. NEO is for salaried new hires regardless of plant location, all hourly employees assigned to KM, and employees who have been unable to attend previous NEO because of full classes. After the July 11 session, orientation will resume in KM building 17, classroom 3, every Monday morning.

Cardiopulmonary Resuscitation Training Class

Our next CPR class will be offered on July 13 and 14 from 5:00 to 9:00 p.m. in the KM employee dining room. Attendance at both classes is required to receive initial certification or recertification. A registration fee of \$5 per person, due before July 11, will confirm your registration. Call the Kearny Mesa fire station (KM 1811) for more details and to register.

Salvage Sale at LF for Employees

An employee stores sale will be held on Saturday, July 9 at the Lindbergh Field salvage yard from 8:00 a.m. to noon. Items such as desks, chairs, file cabinets, wood, and scrap metals, will be available. Children under 15 and pets are not allowed. Open-toed or canvas shoes cannot be worn.

Ten Scholarship Winners Announced

Ten outstanding students, sons and daughters of Convair and DSD-Western Center employees, are winners of the 1983 scholarship awards sponsored by the National Management Association Convair Chapter. The \$1,500 scholarships are made possible by members' donations throughout the year at NMACC meetings and by matching funds from the Fleet Foundation.

The 1983 winners and their proud parents are:

Steven R. Crupi, son of Raymond and Elizabeth Crupi, plans to attend the University of California at San Diego. Ray is a design specialist. **Brady L. Keays** will attend California Institute of Technology. His parents are Wendell and Anita Keays, and Wendell is a senior engineer at Convair. Willard and Hannah Kinney's daughter, **Erin D. Kinney**, plans to study political science at the University of Santa Clara. Willard is a program administrator. **John D. Long**, son of James and Judith Lamb, will attend Boston College. His mother is a stock records clerk. **Andrew E. Manzi** plans to go the University of California at San Diego and major in electrical engineering. His parents are Andrew and Ruth Manzi. Andrew Sr. is a financial specialist. Leslie and Harriet Niss's daughter, **Cathy B. Niss**, will attend the University of California at Berkeley. Leslie is a software manager. **Karen M. Rivera**, Edward and Mary Rivera's daughter, will study business and computer science at the University of San Diego. Edward is an engineer. **Miya M. Shanahan** plans to attend Scripps College. Her parents are David and Jean Shanahan, and Jean is an account technician. **Kim A. Thorsen**, daughter of William and Marcy McPike, will pursue a career in forestry at Humboldt State University. William is an engineering specialist. **Erich W. Wolf, II**, the son of Erich and Mary Ann Wolf, will soon be a pre-med student at Harvard. His father is a structural analysis manager.

Employment

For the week ending June 24, employment was 9,910.

CONVAIR

Weekly Log

July 11, 1983

Published by the Convair Division of General Dynamics

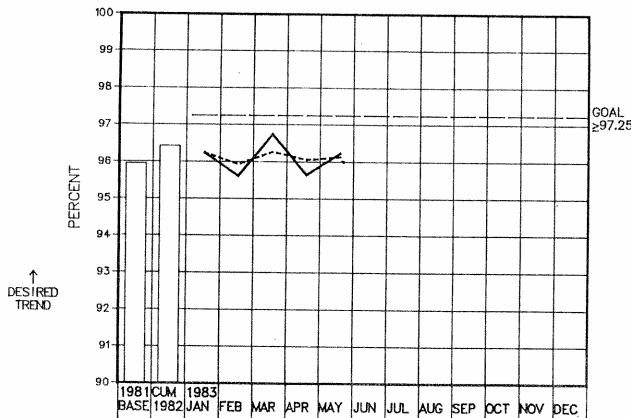
Quality Awareness

QIP Update:

Percentage of Purchased Lots Accepted

Major impacts on production cost, schedule, and quality can be caused by a small number of purchased item failures and rejections, either upon receipt or after use in assembly. To track the quality of supplier material, the number of lots accepted as a percentage of the total number of lots received is determined and reported monthly. The 1983 QIP goal is to keep the percentage of purchased lots accepted to no less than 97.25% of the total purchased. The year-to-date average, which includes the first five months of 1983, is 96.14%.

Percentage of Purchased Lots Accepted



Making a Difference

LF Colocation On Schedule

The Lindbergh Field plant rearrangements are progressing on or ahead of schedule. The successful completion of these projects will consolidate Fabrication facilities within the newly expanded buildings 1 and 75. In addition, Receiving Inspection will be relocated to LF as part of the consolidation of Material Operations. The Energy Systems group will move to the Harbor Drive Facility.

Fabrication Consolidation. To date, over half of the machine tools have been relocated for Sheet Metal, Machine Shop, and Tool Manufacturing consolidations. The remaining machines will be relocated by the end of 1983. Installation of the new paint facility in building 75 has begun; the mezzanine and paint strip tank pits are complete and track for the conveyorized paint system will soon be installed.

Material Operations Consolidation. The consolidation of warehousing in building 4 is complete. Material Control has been relocated to a new complex in building 4, and

the relocation of Receiving Inspection from KM to LF will be complete by the end of July.

Energy Systems Colocation. Refurbishment of the former UOP office buildings at the Harbor Drive Facility is on schedule. When complete, these buildings will become the new home for Energy Systems engineering and administrative personnel. This will consolidate all Energy Systems programs within the Harbor Drive Facility.

EWI Officer Completes Assignment at Convair

Major Peter J. Abadie, the 1982-83 Education With Industry (EWI) Air Force officer, has completed his ten-month assignment at Convair. This year marks the 26th year of participation in the EWI program for Convair.

During his time here, Maj. Abadie was assigned to Integrated Logistic Support. He also received his promotion to Major and received the Meritorious Service Award. He will now travel to USAF Headquarters at Ramstein, Germany, where he will help in the effort to transition GLCM into NATO countries.



Capt. John McKechnie, Commander DCASPRO at General Dynamics Convair Division, congratulates 1982-83 EWI Air Force officer, Maj. Peter J. Abadie.

June Tomahawk Deliveries on Target

Seven Tomahawk production missiles were completed and delivered during June. Four were GLCM vehicles for the first main operating base in Europe. This delivery maintains our commitment to stay two vehicles ahead of the contract requirement, bringing the total GLCM production deliveries to 15 vehicles. The other three vehicles were submarine-launched conventional land-attack missiles. One was delivered to Norfolk early in the month for deployment aboard an operational submarine. The remaining two are pending delivery instructions. In addition to these vehicles, antiship test vehicle T49 completed recertification activity and was delivered to USS *La Jolla*. The missile was launched June 27 and flew a successful antiship mission which ended in impact on the target ship.

Attention: New Procedure for Hazardous Waste Disposal

All departments who generate hazardous waste should be aware that they must comply with a new procedure for the disposal of hazardous waste. This procedure is contained in the Safety Manual Number 21-6, Issue 2. Questions regarding this procedure can be directed to Don Stewart at LF 5660.



Helen Grant

1983's Occupational Health Nurse

The California State Association of Occupational Health Nurses, a 900-member organization, honored Helen L. Grant, R.N., C.O.H.N., at their May conference in Santa Clara, California, by voting her the Occupational Health Nurse of 1983. Schering Pharmaceutical Company presented the award, which reads: "In recognition for outstanding service to occupational health through exceptional day-to-day performance of professional responsibilities in all facets of the Occupational Health Specialty".

The medical services staff, along with Ray Mendoza, manager of Employee Benefits and Plant Protection, re-enacted the presentation ceremony to celebrate the occasion and to show Helen their appreciation. Helen has been with Convair for 31 years and is now the Medical Services supervisor.

Say Goodbye to Potholes on Convair Drive

Repair and replacement of pavement on Convair Drive will begin this week. The area affected extends from Kearny Villa Road east to the entrance to Missile Park. Next week, the road will be resurfaced. Employees who park in reserved parking are cautioned that the resurfacing activity will extend approximately 50 feet into these parking areas and that they will have to make arrangements to park elsewhere the week of July 18. The entire repair project for Convair Drive should be completed by Monday, July 25. Employees are asked to be patient with any inconvenience caused by this project.



Convair Family Fun Day is Sunday July 17, from 10:00 a.m. to 5:00 p.m. The event is free for Convair families and friends, and there will be games, contests, rides, exhibits, displays, and three bands to entertain you. Bring your own picnic basket of food or buy hot dogs, ice cream, sno-cones, cotton candy, popcorn, and other goodies at bargain prices. Be sure to bring your employee drawing card and check in at the registration booth to enter the big cash drawing. The lucky person holding the winning ticket in the special drawing will take home the newly customized 1978 Ford Super Van (see photo). Special drawing tickets will still be available until drawing time. Convair Family Fun Day will be a day you will long remember. Don't miss it!

New Bus Schedule Effective Today

KM • Viewpoint Plaza • Plant 19 • LF

Departs KM with stops at Viewpoint Plaza, Plant 19, and LF. Return trip departs LF with stops at Plant 19, Viewpoint Plaza and KM.

KM to LF via Viewpoint Plaza and Plant 19:

7:00, 8:30, 10:00, 12:00, 1:30, 3:30

LF to KM via Plant 19 and Viewpoint Plaza:

7:50, 9:20, 10:50, 12:50, 2:20, 3:50

Plant 19 to LF:

7:25, 8:55, 10:25, 12:25, 1:55, 3:25

Plant 19 to KM via Viewpoint Plaza:

7:55, 9:25, 10:55, 12:55, 2:25, 3:55

Viewpoint Plaza to LF via Plant 19:

7:10, 8:40, 10:10, 12:10, 1:40, 3:10

Viewpoint Plaza to KM:

8:15, 9:45, 11:15, 1:15, 2:45, 4:15

(arr KM 4:20)

KM • Seville Plaza

Departs KM plant (northwest corner building 5) to Seville Plaza. Returns from Seville Plaza to KM (northwest corner building 5).

KM to Seville Plaza:

7:05, 10:30, 12:05, 3:05

Seville Plaza to KM:

7:15, 10:45, 12:15, 3:15

Schedules list departure times only except as noted. If you have questions, call 2514 at KM, 8621 at LF.

Employment

For the week ending July 1, employment was 9,985.

CONVAIR Weekly Log

July 18, 1983

Published by the Convair Division of General Dynamics

Atlas Scores Another Success from Western Test Range

Atlas 75E successfully launched the NAVSTAR-8, Global Positioning System satellite, into a 10,900-statute mile orbit on 14 July. NAVSTAR-8 is the eighth in a ongoing series, all launched on Atlas E/F. It is the first of the Phase II series initiated by the Air Force's Space Division to provide a space-based long-life radio navigational system and an integrated nuclear detection system platform. The navigational aid system has military and commercial applications for air, land, and sea. The NAVSTAR-8 mission is the first to use the tandem STAR-48 solid rocket motor stage for increased payload capability.

The launch vehicle, Atlas 75E, was originally manufactured by Convair Division as an operational weapon system and delivered to the Air Force in December 1963. After serving on operational status and storage through 1979, 75E was modified, refurbished, and delivered to the Air Force in March 1980 as a space launch vehicle assigned to launch the NAVSTAR-8 mission.



These people contributed to the remarkable production record of the KC/DC-10 program and the 400th fuselage, which is ready for shipment.

400th KC/DC-10 Fuselage Shipped

The 23rd KC-10 and the 400th KC/DC-10 fuselage was shipped out of the Lindbergh Field plant on July 14. This is the 397th unit to be completed on schedule. To commemorate the occasion, George Williams, director of Aircraft Programs, spoke to the large group of support personnel who contributed to this outstanding record to thank them for their excellent work.

Transporting the fuselage to the McDonnell Douglas factory for final assembly was not an easy task. Because of its size, the fuselage had to be pulled from the plant, at midnight, across Lindbergh Field to San Diego Bay. The fuselage was then loaded on a barge and shipped to the McDonnell Douglas factory in Long Beach.

COMING SOON . . .
THE COMPETITION . . .
THE PRIZES . . .
CHARGER SEASON TICKETS . . .
HOME COMPUTER . . .
DETAILS NEXT WEEK!

The Great Talent Search Continues

Response to the employee referral program has been enthusiastic! Over 1,000 GTS referral cards have been received so far this year. Stereo equipment, barbecues, lawn furniture, microwave ovens, and jewelry are just a few of the merchandise awards available to you when your GTS referral is hired and satisfactorily completes 90 days of employment.



To be a winner, you must take the first step: complete the GTS referral card and submit your engineer and scientist referrals. For details, see the program brochure or drop by Professional Staffing at the east end of KM building 1, first floor. Referral cards and brochures are also available at plant entrances and major vending areas. Call Danna d'Artenay, KM 3154, for further information.

June, July Show Increasing GLCM Deliveries

The GLCM program delivered five major pieces of equipment to the Air Force in late June and early July. The equipment included an instructors control unit (ICU) and demounted LCC shelter, which together comprise the third missile procedures trainer (MPT), a launch control center (LCC-5), and two transport-erector-launchers (TELs 11 and 12). The MPT and LCC were delivered to Davis-Monthan AFB in Arizona to support Air Force missile launch crew training. The TELs are scheduled for delivery later this year to support initial operational capability (IOC) of the first GLCM Main Operating Base in Europe.

Patent Issued to Convair Inventors

Steve Cunningham and Hugh Arrendale of Advanced Energy Systems and James Marsden, who was a summer engineering intern in 1980, have just been granted U.S. Patent No. 4,375,659. The patent involves an electronic circuit for detecting and analyzing "normal" zones in a superconducting coil. The "normal" zones are relatively warm spots in the extremely cold coils.

Facelift for Building 26

The refurbishment work that began on the exterior of building 26 at Kearny Mesa will extend into this week. Some noise may result from sandblasting activity, so please be patient with any inconvenience caused by this project.

EEO at Convair

The Equal Employment Opportunity (EEO) office is responsible for developing, coordinating, and analyzing the equal opportunity and affirmative action programs at Convair. The EEO administrators, Barbara Wildaur and Ozell Grissom, have offices at Kearny Mesa and Lindbergh Field and are available to answer your questions. They can be reached at KM 2255 or LF 8919.

For more information about EEO, department coordinators are also available to assist you.

Department	Coordinator	Extension
Quality Assurance	Jack Sanders	KM 1140
Finance	Bob Langsfeld	LF 4610
	Brenda Stacy-George	LF 4610
Program Development	Norm Rutherford	KM 1153
Contracts & Estimating	Cissy Marden	KM 6361
Research & Engineering	Sara Boehmer	KM 2705
	Wayne Woods	KM 2525
Material	Chuck Patmon, Sr.	LF 8382
DSD-Western Center	Donna Kaptain	KM 6606
Operations	Joe Stelmah	KM 5980
Integrated Logistics	Frank Rojas	KM 3617
	Roy Sommers	KM 1496

June Retirees

Convair extends a warm thank-you and best wishes to these employees who retired last month.

Name	Department/Title	Years of Service
Harold J. Albright, Jr.	131-3 Sr. Security Officer	27
Leon D. Barnes	463-3 Mfg Engrg Ops Spvr	12
Leslie H. Cooke	350-0 Inspector Msl Final Assy	41
Cecil R. Duquesne	985-3 Traffic Rate Clerk A-OS	24
Kenneth F. Eveland	761-0 Msl Checkout Mechanic	34
Robert A. Goad	015-0 Mechanic-Milling Machine	33
Warren B. Jones, Jr.	800-0 Mgr-Subcontract Mgmt	26
Anne S. Kelly	193-1 Secretary	24
Benjamin H. Kilander	264-0 Publications Editor	10½
Masanobu C. Miyaji	633-5 Sr. Scientist	27
Leon W. Mullaney	131-4 Sr. Safety Engineer	4
Robert J. Nickerson	281-4 Group Leader LG7	31
John M. Norman	362-0 Sr. QA Specialist	31
Raymond E. Olson	015-0 Machinist—NC-Machine	27
Clarence E. Rice	067-0 Gen Spvr Mfg Operations	43
Predy W. Rogers	985-3 Material Control Analyst	22½
Gertrude J. Silva	431-0 Statistical Clerk	32
John Solowey	759-0 Resistance Weldor	26
Kenneth S. Taylor	979-1 Base Launch Ops Spvr	27
Leonard M. Therrien	015-0 Machinist Group Leader	30
Kenneth Watkins	264-0 Sr. Pub Tech Specialist	30

Bus Schedule Correction

The correct departure times for the Plant Services bus from KM to LF via Viewpoint Plaza and Plant 19 are: 7:00, 8:30, 10:00, 12:00, 1:30, 3:00

Convair Drive Resurfacing Project

The repair work on Convair Drive is nearly complete and resurfacing is scheduled to begin this week. The project should be complete by Monday, July 25. Employees are reminded once again that the resurfacing project will extend 50 feet into the parking area including the reserved areas. All affected personnel are asked to make other arrangements while this work is going on.

Notice from Point Loma Federal Credit Union

A printing error on the notice included with the July checking account statements from PLFCU has resulted in some confusion among members of the credit union. The notice was to inform members about an increase in fees for checks returned because of insufficient funds. This fee will be assessed ONLY on checks returned due to insufficient funds, not on all checks deposited. The credit union regrets this error.



HEALTH FITNESS CENTER

GENERAL DYNAMICS • CONVAIR RECREATION ASSOCIATION

- **Professional Image Workshop** — July 23. Separate workshops for men and women.
- **Pritikin Diet and Exercise Lecture** — July 26. Learn more about the role of diet and exercise in optimal health. This free lecture begins at 4:30 p.m.
- **Rock A'Robics** — July 25 and 26. Free introductory aerobic dance classes at 4:30 p.m. both days.
- **Right/Left Brain Integration** — July 26. A stress management program presenting the latest research information that can affect your decision making, communication, and creative skills. Class meets from 4:45 to 6:00 p.m.
- **WORKOUT** — August 1. Floor exercise classes to meet on Mondays and Wednesdays at 4:30 p.m.
- **Triathlon Seminar** — August 3. This free seminar features special speakers and begins at 5:00 p.m.
- **Shape Up Exercise Class** — August 8. A seven-week exercise and evaluation program. Classes meet at KM and LF locations and begin at 4:30 p.m.

Call the Health Fitness Center for class fees, registration, and information at KM 3567. Health Fitness Center members receive discounts on all programs.

Employment

For the week ending July 8, employment was 10,067.

CONVAIR Weekly Log

July 25, 1983

Published by the Convair Division of General Dynamics

Industrial Modernization Incentives Program (IMIP)**Integrates Productivity Efforts at Convair**

Secretary of Defense Caspar Weinberger has established the tri-service Industrial Modernization Incentives Program as his number-one priority for productivity improvement throughout the defense industrial base. In response, General Dynamics Convair Division is developing a technology strategic plan through its own IMIP. When the plan is fully implemented, it will ensure our capability to produce sophisticated aerospace products using the best and latest technologies.

Why Technology Strategic Planning? According to Kate Coleman, IMIP program manager, studies to date reveal an increasing need for more sophisticated technology strategic planning for two basic reasons: first, the rapid proliferation of advanced technologies on the factory floor, which are becoming too complicated and interrelated to be adapted without careful top-down planning; and second, the need to apply computer-aided technologies to factory operations.

Technology Strategic Plan Concept. The technology strategic plan is a structured approach to factory modernization efforts for all Convair product lines. Both long- and short-range goals will be addressed and included in the plan. Five drivers will be used to establish an in-depth data base: market, technology, future trends, competition, and existing resources. This data base will be used to forecast what the Convair factory should be in 1990 and to address today's problems and costs.

Where is the Program Office Located? The IMIP office was set up early this year on the first floor of Kearny Mesa building 3. For further information, please stop by the office or call them at KM 1166 or 1551.



General Manager John McSweeney hosted Congressman C.W. (Bill) Young (R-Fla) on July 5, for a tour of cruise missile production facilities at Convair and briefings on cruise missile and space programs. Congressman Young is a member of the House Committee on Appropriations and the Subcommittee on Defense. He is shown here (right) with Gordy Lundquist, general supervisor-Operations, and Ed Squires, division vice president, Cruise Missile Product Line Operations.

**COMING SOON . . . THE COMPETITION . . .****Da Pra and Lake Are Bond Drive Co-Chairmen**

This may be the last time Dan Da Pra and Ken Lake shake hands until the 1983 U.S. Savings Bond campaign comes to an end. The two men are co-chairmen of this year's campaign that pits Lindbergh Field, Plant 19, the Ramp, and Western Test Range against Kearny Mesa, Sycamore Canyon, Eastern Test Range, Mission Plaza, and Seville Plaza. The competition is to see which team can produce the best bond participation. Ken Lake heads the LF team and Dan Da Pra the KM team.

Besides the thrill of competition, some great prizes await bond purchasers. At the end of the campaign, a drawing among all participants will be held for prizes that include Charger season tickets, reserved parking spaces, and more. Employees will be receiving campaign materials before the kickoff set for the week of August 8. Meanwhile, watch for more details about The Competition.

7th Consecutive Successful Tomahawk Test Flight
Tomahawk T47, an antiship missile, flew a successful mission last week, scoring a direct hit on a target ship on the Pacific Missile Test Center range. The missile was launched from a torpedo tube of the attack submarine USS *La Jolla* (SSN 701) to test its ability to search for, locate, and attack a ship target. All test flight objectives were met.

This was the seventh consecutive successful test flight of a Tomahawk during the last three months. These tests have demonstrated the missile's capability for both land-attack and antiship missions. The tests included five launches from a submerged submarine, one from the deck of the battleship USS *New Jersey*, and one from a ground-based launcher at the Utah Test and Training Range.

Liquid Material Storage Consolidated at KM

The barrel yard and temperature-sensitive material storage have been moved from Lindbergh Field to

Kearny Mesa building 73, a newly constructed building specially designed for environmentally controlled storage. Some new procedures are in effect as a result of this move. All materials will be issued in original containers. As a result, no open containers will be stored at the barrel yard. Empty gas cylinder racks are to be returned to building 73; empty containers, carboys, and barrels should be sent to the salvage yard at KM; and all refrigerated material will remain at LF.

A reminder: containers of hazardous waste must be handled in accordance with Safety Procedure, Section 21-6, of the Convair Safety Manual. Questions regarding the new procedures can be directed to Don Stewart at LF 5660.

Telephone Congestion

Because of the increased activity at Convair and a shortage of Pacific Telephone central office equipment, the switchboard, tielines, and outgoing lines are busy. All of these problems will be eliminated on September 26, when the new Dimension telephone system is installed. A few tielines to Lindbergh Field will be available within three weeks and additional operators have been brought on board, but the busy conditions will continue until the new system is installed.

The Telecommunications department asks for your patience and offers these suggestions in an effort to ease the problem:

- If you are calling LF from KM and the tielines are busy, dial 9 + 692 + extension.
- Please do not call outside from LF to KM; the KM switchboard is the most congested.
- To help the switchboard operators, give callers your current extension.
- Remember — the use of company telephones, for incoming and outgoing calls, is limited to business matters relating to Convair except in cases of emergency.

Transportation Safety Program

The Transportation department is conducting a driver awareness and safety program for everyone who drives company trucks, vans, cars, tow tractors, forklifts, electric carts, and shop tuggers. Last year, Convair was recognized by the San Diego Safety Council for maintaining a low accident-to-miles-driven ratio. The Transportation Safety Program, a one-hour motor vehicle safety class, is part of Transportation's continuing effort to maintain Convair's outstanding safe-driving record.

Supervisors are asked to have those people in their departments who drive vehicles or shop equipment attend one of the classes offered at:

Lindbergh Field building 14 auditorium

July 26 — 9:15-10:15 a.m.

August 2 — 11:40 a.m. - 12:40 p.m.

August 9 — 3:40-4:40 p.m.

Plant 19 building 2, column C-3, mezzanine classroom
July 27, August 3, and August 10 — 9:15-10:15 a.m.

Introducing MICOL

Material Inventory Control On-Line (MICOL), the new on-line computer system that is replacing the batch process MICS system, was recently implemented at Convair. The original software package was purchased from

Martin-Marietta and modified to meet Convair's specifications.

Presentations are scheduled this week to provide an overview of the MICOL (Phase I) system. Those who need to know how to access the system and make on-line inquiries should plan to attend one of the following sessions:

Kearny Mesa: July 26, 1:00 p.m.

conference room A, building 2

Lindbergh Field: July 27, 1:00 p.m.

building 14 auditorium



Steve Woolley, Dick Stohr, and Lou Imbimbo.

Picnic A Huge Success

Convair Family Fun Day on Sunday, July 17, was a huge success. According to picnic co-chairman Steve Woolley, between 10,000 and 12,000 hungry people attended the festivities at Missile Park (the crowd consumed 7,000 hotdogs). Dick Stohr, Department 633, was the happy winner of the customized van. Clark Waite, Department 565, won the camera, and Lori LaFontain, Department 250-2, won the CB radio.

During the day, Mike Keel, division vice president, Cruise Missiles, dedicated a Tomahawk missile, which will be on permanent display at Missile Park. The sounds of music from a country-western band, a bluegrass band, and the Mesa College Band kept the day festive. Hats off to all the people who made Family Fun Day a day to remember!

Health Fitness Center News

• Wellness Sweepstakes — August 1-31

Win 1983 Charger season tickets, Olympic Games tickets, "A Day at the Races," and more! Wellness Sweepstakes contest rules are available at the Health Fitness Center.

• HFC Wellness Special — August 1-31.

— 10% discount to all new HFC members.
— Free nostalgia T-shirts to the first 100 new members.

• Rock A'Robics — July 25 and 26. Free, introductory classes offered both days.

• Right/Left Brain Integration — July 26.

HFC members receive discounts on all programs. For more information or to register, call HFC at KM 3567.

Employment

For the week ending July 15, employment was 10,157.

CONVAIR Weekly Log

August 1, 1983

Published by the Convair Division of General Dynamics



GLCM Flight Test Milestone

The successful July 27 launch of T97:1 at Dugway Proving Grounds completed the Air Force Test & Evaluation phase of the GLCM Full Scale Development Program. The missile flew for nearly two hours and overflew the target after more than 700 miles.

The development flight test program consisted of ten launches. The first three flights were for Contractor Test & Evaluation (CT&E). The latest test, the eighth good flight out of ten, completed the program with three successes in a row. A Convair test team assisted the Air Force in supporting all the GLCM flight tests.

Besides marking the completion of the very successful GLCM AFT&E test program, the flight was the 106th for Tomahawk and the eighth consecutive flight success for both SLCM and GLCM. The GLCM test program will now enter into Follow-On Test & Evaluation (FOT&E). Sixteen flights are scheduled over the next two years to verify operational procedures and objectives. A Convair test team will continue to assist the Air Force.

New CRAD for Convair

SLATS Photovoltaic Concentrator Module. The U.S. Air Force Systems Command has awarded General Dynamics Convair Division a contract to design and fabricate demonstration models of the survivable low

aperture trough (SLATS) solar concentrator. The need for greater spacecraft hardness through the use of concentrator solar arrays has been established. The SLATS solar concentrator is one of two designs being considered for full scale development to meet the needs for enhanced spacecraft survivability. The program involves design optimization, fabrication of demonstration modules representative of flight hardware, and testing the modules under normal solar and laser threat irradiance conditions. Ted Stern is the program manager.

Structural Tests on the SMM. The Flight Dynamics Laboratory at Wright-Patterson Air Force Base has awarded Convair's Advanced Space Projects a contract to conduct structural tests on the spacecraft maneuver module (SMM). The tests will be conducted at our Harbor Drive Facility later this year. The test results will draw attention to the performance benefits offered by lightweight graphite-composites and may lead to the design of future graphite-composite vehicles.

The SMM is a versatile propellant stage designed to be placed in orbit from the shuttle orbiter bay. It fills the emerging need for a satellite kick stage, a maneuver stage for threat avoidance, a maneuver stage for satellite storage and reconstitution, and for teleoperator operations. The SMM prototype, constructed in 1982 as part of Convair's IRAD program, is the first graphite-composite rocket stage. The program manager is David E. Hays, Department 616.

THE COMPETITION IS ONLY ONE WEEK AWAY! U.S. Savings Bond Campaign Kicks Off August 8

Ten reasons why you should buy U.S. savings bonds:

1. Bonds have a purchase price of half their face value.
2. U.S. savings bonds are guaranteed by the U.S. government.
3. Interest rates are now competitive with other forms of investment, despite changing market conditions.
4. When you hold bonds five years or longer, they pay 85% of the average market rate on treasury securities during the same period.
5. There is no upper limit on how much bonds can earn, and you are guaranteed to earn no less than 7.5% interest on bonds held to maturity, even if market rates fall below this amount.
6. Through payroll deduction for U.S. savings bonds, you benefit from automatic savings. If you can't see it, you don't spend it.
7. You pay no state or local income tax on U.S. savings bond interest. Federal income tax may be deferred until the bonds are cashed.
8. You can demonstrate your patriotism and contribute to our country's future by buying bonds.

9. Bonds can be used as a cash reserve or as tailored savings for college educations, home improvements, a new car, or a vacation.
10. You can win some great prizes in The Competition ...including Charger season tickets, \$100 bonds, reserved parking, and more.

Employees will receive campaign materials next week. Get your team spirit ready!

Transportation Safety Program Schedule Correction

Due to typographical error and an inadvertent omission in the July 25 *Weekly Log*, the class schedule for the Transportation department's one-hour motor vehicle safety class has been reprinted.

LF, building 14, auditorium

August 2 and 9 (Tuesday):
 9:15 to 10:15 a.m.
 11:40 a.m. to 12:40 p.m.
 3:40 to 4:40 p.m.

Plant 19, building 2, column C-3

August 3 and 10 (Wednesday):
 9:15 to 10:15 a.m.

KM, Educational Services building 17, room 9

August 3 and 10 (Wednesday):
 1:40 to 2:40 p.m.
 2:40 to 3:40 p.m.
 3:40 to 4:40 p.m.

Cyber Orientation Class Open

Registration is now open for a three-hour orientation class in the effective use of the Cyber computer at Kearny Mesa. The one-session class, which has been held weekly, will be scheduled again when the class limit of 20 is registered. The class is directed toward new users interested in scientific programming. You must have some background in Fortran and computer applications, and be able to use the computer's power for your daily operations. Call the Cyber advisor, Jack Wood, for reservations at KM 3625. Manager's approval and department charge number are required.

Quality Circles Keep on Growing

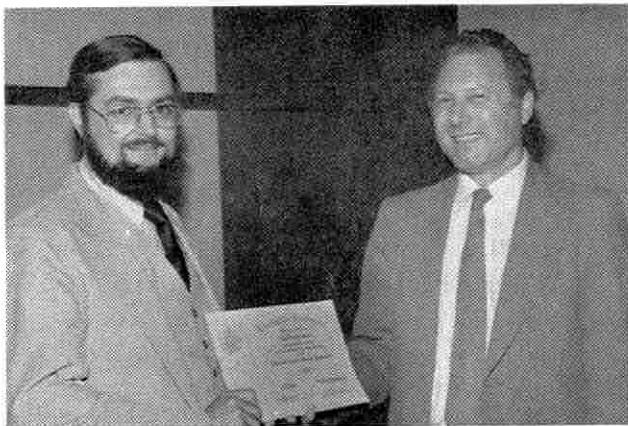
Eighteen Convair supervisors graduated from the two-day training for Quality Circle leaders at Miramar College July 13 and 14. The newest circles are located in the Boeing 767 strut assembly area at Lindbergh Field, Inspection, Ground Electronics Lab, and Finance.

Quality Circles are small groups of employees who meet for one hour a week to solve work-related problems. With 30 operating circles, each with an average membership of 10 employees, over 300 hours per week are devoted to quality issues. The next leader training for supervisors will be held August 24 and 25. For more information on the training, call Roberta Baade, KM 2256.

Five Quality Circles are operating at Data Systems Division-Western Center: Telemetry Data Processing, Data Entry/Control, Financial/Accounting Systems, Documentation Services, and Human Resources. The DSD program is expanding, too. Five new circles are projected to be organized by the end of the year. Call Judy Braun at KM 6606 for information on QCs at DSD-Western Center.

Parking Improvements at Lindbergh Field

Beginning today, more than 150 parking spaces have been made available to open parking at the flight line lot 11 parking area at Lindbergh Field. To accommodate the additional open parking spaces, reserved parking has been relocated west of building 4. This answers a near-term need for more parking. Additional improvements are in the works as well. Del Dimmitt, chief of Plant Protection, estimates that substantial improvements to plant parking at LF will be made during the next six weeks.



David Barker graduated from the apprenticeship program as a Numerical Control Machining Programmer. He completed the program six months early because of his exceptional progress and strong endorsement from his supervisors. Presenting the journeyman certificate is Norm Pearl, manager of Production Engineering.

Wanted: Science Fair Volunteers

The NMACC Adopt-A-School committee is looking for individuals to volunteer their time to help students prepare their projects for entry in the San Diego Science Fair. If you are willing to volunteer your skills, knowledge, and guidance, please call Janice Rooths at KM 6397.

Health Fitness Center News

- Wellness Sweepstakes — August 1-31.
 Win 1983 Charger season tickets, Olympic Games tickets, "A Day at the Races," and more! EveryBODY's a winner in August. Wellness Sweepstakes contest rules and information are available at the Health Fitness Center.
- HFC Wellness Special — August 1-31.
 — 10% discount to all new HFC members.
 — Free nostalgia T-shirts to the first 100 new HFC members.
- Shape Up
 — Harbor Island class: August 8-September 24.
 — Kearny Mesa class: August 8-September 26.
- WORKOUT — August 1-September 2.
- Free Triathlon Seminar — August 3.

HFC members receive discounts on all programs. For more information or to register, call the HFC at KM 3567.

Employment

For the week ending July 29, employment was 10,222.

CONVAIR Weekly Log

August 8, 1983

Published by the Convair Division of General Dynamics



John McSweeny, Adm. Hostettler, and Mike Keel with the Tomahawk flag presented to Convair by Hostettler.

Tomahawk Flag Presentations Conclude Successful All-Up-Round Program Review

Rear Adm. Steven J. Hostettler, director of the Joint Cruise Missiles Project, spoke to large groups of employees at Kearny Mesa, Lindbergh Field, and Plant 19 last week. To the people who work on the Tomahawk program he said, "Thanks to each and every one of you — it's a pleasure to have you as part of the team."

Mike Keel, division vice president-Cruise Missiles, led off the program at Kearny Mesa and reviewed the outstanding Tomahawk record since the first of the year. He highlighted the three key points leading to these successes: performance, colocation, and attention to detail.

Adm. Hostettler spoke about the importance of the Tomahawk program. After narrating a film of recent Tomahawk flights, he presented special Tomahawk flags to Convair with the charge that he wants to return within a year and place a gold "E" on it if we have sustained our performance on the program. For all you landlubbers, the gold "E" is a Navy tradition, a special award for excellence. Keel and McSweeny accepted the flags and the challenge.

The flag presentations capped a successful Tomahawk All-Up-Round Program Review attended by 40 prime contractors on August 2 and 3. Tomahawk flags will fly at Kearny Mesa, Lindbergh Field, and Plant 19.

Savings and Stock Plan Values for July

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.6307	\$ 2.9708	\$ 3.5030
Diversified Portfolio	2.1383	1.9021	3.3103
Fixed Income	1.2161	1.3531	1.5146
Hourly			
Government Bonds	2.6279	2.9679	3.5012
Diversified Portfolio	2.1851	1.9413	3.3815
GD Stock	\$32.3750	\$28.0000	\$54.0000

To: All Employees

Our 1983 U.S. Savings Bond Campaign begins today. This year two teams are competing to see who can produce the best participation. Good luck to Ken Lake's Lindbergh Field Liberators and to Dan Da Pra's Kearny Mesa Stars!

Last year your support made possible some impressive accomplishments. Convair, along with Western Center, placed first in the corporation among major divisions and achieved 91% participation in the campaign. This year, our goal is to reach 99% participation.

I invite you to join once again the millions of men and women who are taking stock in the future of America and providing themselves with an excellent investment opportunity as well. With your enthusiastic support, we will once again demonstrate that we are a determined teammate of our customer, the U.S. government.

John McSweeny
General Manager

July Tomahawk Deliveries Continue On Target

Four Tomahawk production missiles were completed and delivered during July. All four were GLCM vehicles for the first Main Operating Base in Europe. A fifth production GLCM, completed and sold on August 1, brings our total GLCM production deliveries to 20, fulfilling the requirement for the first Main Operating Base. The July deliveries put us three GLCM vehicles ahead of the contract requirements. In addition to the production deliveries, test vehicles T97, T47, and T103 were completed and delivered during July.

New Business for Convair

TAV Study Contract. Work began last week on a study to optimize the shape of the transatmospheric vehicle (TAV). TAV is envisioned as a hypersonic, manned, military aerospace vehicle to operate between 100,000 and 260,000 feet at velocities of about Mach 20. It is projected that such a vehicle will reach initial operating capability by the year 2000.

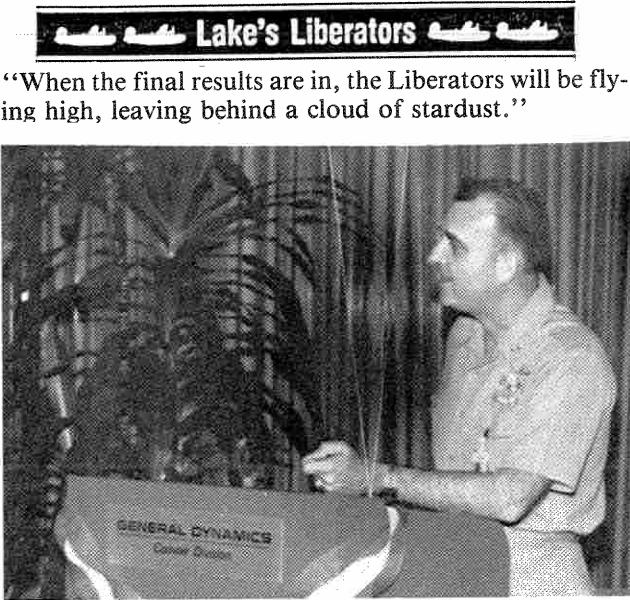
The thirty-month study is sponsored by the Air Force's Wright Aeronautical Laboratories in Dayton, Ohio. Study tasks are to develop preliminary concept designs, evaluate the performance effects of variations in the geometry of design components, perform experimental wind tunnel tests, and define the optimum configuration. Dave Brower is the program manager.

U.S. Savings Bond Campaign Kickoff Today

Competition For Participation and Great Prizes

It's Dan Da Pra's Stars — Kearny Mesa, Mission Plaza, Seville Plaza, and ETR — against Ken Lake's Liberators — Lindbergh Field, Plant 19, the Ramp, and WTR — for the championship of the U.S. Savings Bond campaign. Regardless of who wins, we all have a chance for some great prizes. At the end of the campaign, all bond purchasers' names will go into a drawing for a pair of 1983 Charger season tickets, 4 \$100 bonds, and several reserved parking spaces. The goal for the division is to achieve 99% participation and to be number one in the corporation in bond purchases.

Dan Da Pra's KM Stars vs Ken Lakes' Liberators The Sky is the Limit!



Rear Adm. Steven J. Hostettler spoke to the bond campaign coordinators at the kickoff breakfast.

Bond Kickoff Breakfast Attended by Rear Adm. Hostettler

Remarks by Rear Adm. Steven J. Hostettler and a surprise appearance by Uncle Sam highlighted the kickoff breakfast on August 2 for the U.S. Savings Bond Cam-

Lake's Liberators ★★★★ DaPra's Stars ★★★★

"Kearny Mesa Stars will prove unbeatable as we battle Ken Lake's Liberators to buy the most and invest in the best U.S. Savings bonds ever!"

paign. Rear Adm. Hostettler, who was here for the Tomahawk All-Up-Round Program Review last week, said he was impressed by the level of past participation at Convair and the spirit shown for this year's bond drive.

General Manager John McSweeney introduced Hostettler and said that today more than ever before, U.S. savings bonds are a good investment. In November 1982, Series EE bond interest rates were changed to pay 85% of the average market rate on Treasury Securities, with a guaranteed minimum of 7.5%.

Uncle Sam (Leo Springer, of Research & Engineering, in full costume) made his entrance and took his place at the red, white, and blue balloon-festooned tables of Dan Da Pra's Kearny Mesa Stars. Ken Lake, on the Lindbergh Field Liberators' side of the room, viewed the helium balloons and declared that his campaign would not be run on hot air alone.

With challenges and speeches over, the coordinators for both teams received their campaign materials and left with renewed team spirit.

Security: It's Everyone's Job!

Convair is growing. So is the amount of electronic equipment such as computers, word processors, and memory typewriters. We need to be reminded that electronic equipment is not authorized for the processing of Department of Defense classified information without prior approval from the Industrial Security department. If your electronic equipment can read, display, store, or produce material, contact Industrial Security, KM 1471, before processing classified material.

Electronics Division Telephone System Cutover

Electronics Division has a new Dimension telephone system. The new dialing instructions are:

From Convair Kearny Mesa to:

ED Balboa buildings	87 + ext
ED Kearny Mesa	87 + ext
ED Lindbergh Field	87 + ext

From Convair Lindbergh Field to:

ED Balboa buildings	100 + 87 + ext
ED Kearny Mesa	100 + 87 + ext
ED Lindbergh Field	100 + 87 + ext

ED directories are available at division distribution.

Reminder for Supervisors

Attendance at the safe driving classes is mandatory for all employees who operate Convair-owned vehicles. Here is the schedule of remaining classes:

LF, building 14, auditorium — August 9 & 16: 9:15 to 10:15 a.m., 11:40 a.m. to 12:40 p.m., 3:40 to 4:40 p.m.

Plant 19, building 2, column C-3, Mezzanine classroom — August 10 & 17: 9:15 to 10:15 a.m.

KM, Educational Services building 17, room 3 — August 10 & 17: 1:40 to 2:40 p.m., 2:40 to 3:40 p.m., 3:40 to 4:40 p.m.

Health Fitness Center

The Health Fitness Center has dedicated the month of August to improving your well-being by offering many new exercise classes and health seminars, all at special savings to HFC members. For more information or to register, call the Health Fitness Center, KM 3567.

Employment

For the week ending July 29, employment was 10,273.

CONVAIR Weekly Log

August 15, 1983

Published by the Convair Division of General Dynamics

New CRAD at Convair

OTV Servicing Study Follow-On. Convair has been awarded an eighteen-month follow-on contract for the orbital transfer vehicle (OTV) servicing study. The study will refine and update the definition of developmental missions for servicing space-based OTVs on an early 1990s manned space station. The space-based OTV is a cryogenic vehicle that will offer performance improvements, such as reusability and greater payload capacity, over vehicles carried into orbit by the shuttle. The study will also look at the capability of the early space station to launch a Shuttle/Centaur and explore the possibility of recovering the Centaur for use on later missions.

These operations will contribute to the development of a fully reusable space-based OTV. In addition, the study will produce cost and planning information for developing the capabilities of a space-based OTV. Otto Steinbronn is the Space Station program manager and John Maloney is the study manager.



Debby Syverson, Bette Clancy, and Helen Grant.

Dual Honors for Bette Clancy

On August 3, Bette Clancy (Dept. 191-0) received recognition for two achievements. Bette is retiring soon, and her department supervisor Sheila Peralta presented her with her 30-year service award. In addition, Bette was honored for her outstanding contributions to the San Diego Blood Bank. Since 1953 she has participated in every Convair blood drive and has also responded immediately to the Blood Bank when called (her generous support equals 30 gallons of blood!). Debby Syverson, the San Diego Blood Bank's coordinator for the Convair blood drive, presented Bette with a plaque and glowing words of praise and thanks. Helen Grant, Medical Department supervisor, who participated in the occasion, said that she hopes more Convair employees will follow Bette's example and make the upcoming October blood drive the most successful ever.

**Service Award Breakfast**

Employees who completed 35 or 40 years of service were honored at a breakfast in the executive dining room on July 29. General Manager John McSweeney thanked each of the honorees for their many contributions to Convair. Pictured from left to right: Dave Archibald (staff), Albert Seitz (35), John McSweeney (general manager), Silmon Webster (40), Edwin Kerfeld (40), Bill Rector (staff), Robert Ferguson (35), Rogelio Berman (35), and Ken Lake (staff).



The 1983 summer youth management interns: Front row (left to right): Beatriz Ruvalcaba, Gina Buccat, Rosanne Adame, Norma Talamantes. Back row: Richard Aguirre, John Abaroa, Irene Robles, Michael Apan, Elizabeth Benitez, Hien Nghiem, Martha Cueva.

Youth Management Internship Program

Eleven young men and women have been lending Convair their enthusiasm and skills as they receive valuable work experience and the chance to see how their educational and vocational goals relate to the needs of industry. They are part of the Youth Management Internship Program. This summer, each will spend thirteen weeks in various departments throughout Convair. Selected managers, supervisors, engineers, and other professionals are serving as mentors to guide the students in their work experience. Corky King is the program coordinator and the mentors are Carl Pereira, Bruce Marshall, Steve Woolley, Wayne Zupkas, Buzz Prettyman, Pete Nickson, Maury Wolfe, Larry Shaw, Dan Bain, John Coulson, and Marv Tooley.

Round Two: Lake's Liberators vs Da Pra's Stars

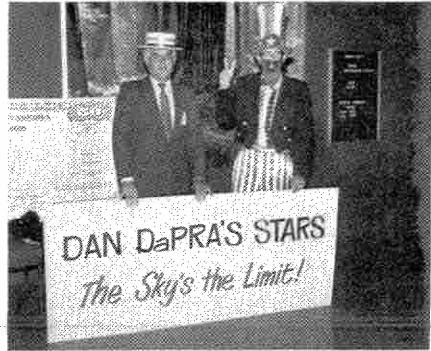


Photo 1: The Liberators and Stars are nose-to-nose in the bond campaign, along with their leaders Ken Lake and Dan Da Pra. The competition is too close to call, but large numbers of departments were reporting 100% participation at the close of last week. **Photo 2:** Lake's Liberators asked Adm. Hostettler to sign the big bond during his visit to Lindbergh Field on August 3. Looking on are Ken Lake, Frank Signorelli, Ed Squires, Mike Keel, and Jerry Garrison. **Photo 3:** Dan Da Pra's Kearny Mesa Stars were inspired by the appearance of Uncle Sam at the bond kickoff.

Learning Opportunities

NMA Convair Chapter learning opportunities are open to all Convair employees. For more details about NMA courses and seminars, read the *Educational Bulletin*, published monthly by Educational Services.

Personal Skills for the Manager — This eight-week course, which is part of the Certified Management course series, begins September 7. Classes will meet from 4:30 to 6:30 p.m. in conference room E-6, 6th floor of KM building 3. Register with Art Drown, LF 5780, or Julian Jaeger, LF 5912.

New Age Thinking — The 30-hour seminar is scheduled for September 6, 8, 10, 13, 15, 20, 22, 24, and 27, from 5:00 to 8:00 p.m. weekdays and 8:00 a.m. to 12:30 p.m. on Saturdays. Register with Mark Schwartzel, KM 3218, or Judy Braun, KM 6606.

Change in Our Lives — A 90-minute workshop, co-sponsored by NMACC and CRA, focuses on the skills needed to cope with the major passages that we experience during our lifetime. The workshop will be held on September 13, from 4:45 to 6:15 p.m. in the CRA pavilion. Register through the Health Fitness Center, KM 3567.

Health Fitness Center News

- **Wellness Sweepstakes** — August 1-31. Stop by the HFC for Wellness Sweepstakes contest rules.
- **HFC Wellness Special** — August 1-31.
 - 10% discount to all new HFC members.
 - Free nostalgia T-shirts to the first 100 new members.
- **Stress Reduction Seminar** — Tuesday, August 16, at 4:30 p.m. in the CRA TV lounge.
- **Tai Chi** — A free, one-hour seminar on Thursday, August 18, 4:45 p.m. in Missile Park.
- **Yoga** — A five-week session begins at 4:45 p.m. on Tuesday, August 23, in Missile Park.
- **Mr. & Ms. HFC Contest & Silent Auction** — Tuesday, August 30, at 4:30 p.m. in the Missile Park pavilion.

Health Fitness Center members receive discounts on all programs. For more information or to register, call the HFC at KM 3567.

The Society of Women Engineers

Women engineers are invited to join the San Diego County Chapter of the Society of Women Engineers. Monthly meetings cover a wide range of topics, including technical presentations, professional development, and financial planning. Chapter members have been judges at local science fairs, speakers at school career days, and have frequently toured local industries. Men are invited to join, too. The meetings are held in the CRA clubhouse on the last Wednesday of each month. For more information, call the SWE Convair representative, Kathy Green, at KM 6930.

Wanted: Science Fair Volunteers

The NMACC Adopt-A-School committee is looking for individuals to volunteer their time to help students prepare their projects for entry in the San Diego Science Fair. If you are willing to volunteer your skills, knowledge, and guidance, please call Janice Rooths at KM 6397.

SSIP Values

Last week's SSIP values were for June, not July.

Reminder for Short-Term Car Renters

Convair's prime contract for short-term car rental in San Diego and Los Angeles is with Ladki International Rent-A-Car. The contract was awarded on the basis of Ladki's low prices, and we are bound by the terms of the contract to call them first. Budget is the back-up source. Other car rentals should be used only if the prime and back-up sources cannot meet your needs. You can reach Ladki between 8:00 a.m. and 6:00 p.m. at 233-9333, and airport pickups and deliveries will be provided during those hours. After-hours service can be arranged by contacting Ladki's Laurel Street office one day in advance.

Employment

For the week ending August 5, employment was 10,325.

CONVAIR Weekly Log

August 22, 1983

Published by the Convair Division of General Dynamics

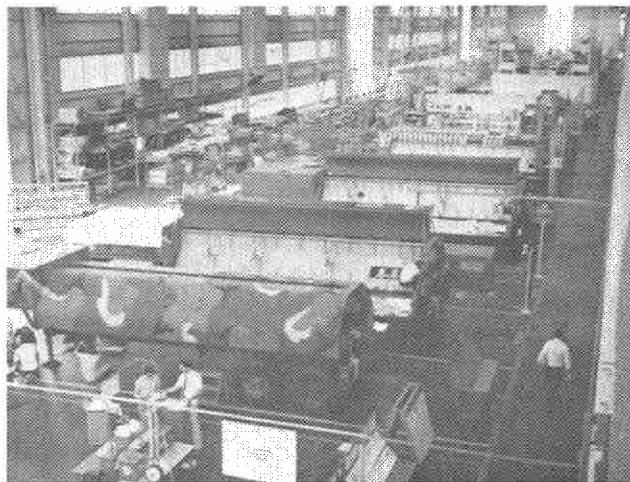
TEL/LCC Production



TEL Upper Strongback Schedule Shows Strong Improvement

Long hours and hard work have paid off for the TEL upper strongback assembly team at Plant 19. Article 21 will be the first upper strongback to meet the 190-hour production target. Standing by the upper strongback are some of the people who contributed to this accomplishment (photo above, from left): Javier Gonzalez, Ed Squires, Lou Imbimbo, Raul Naranjo, Jr., Jose Roque-Montes, Mike Zaragoza, Maria Fischer, and Roger Rote. (That's the upper strongback in the background.)

The upper strongback is the upper structural member of the TEL missile bay that holds the side loading doors. Because of the structural requirements on the strongback, the quality of workmanship must be



TEL/LCC production line at AF Plant 19 shows seven TELs in various stages of completion. Two units in foreground are ready for delivery. Third unit has since been moved to Kearny Mesa to begin the selloff.

perfect. In addition to meeting their schedule on Article 21, the upper strongback team has reduced QARs to zero on Article 22.

Many support functions have worked with the shop to meet the cost and schedule goals. According to Mike Zaragoza, Operations supervisor, the upper strongback achievement is one step toward reaching cost and schedule goals for the entire TEL program, which includes the lower strongback, final assembly, box assembly, and side loading doors.

Convair Wins New Contract

LADAR Guidance System Study Contract. The U.S. Air Force Armament Division has awarded General Dynamics Convair Division a twelve-month study contract to develop the conceptual design of a laser radar (LADAR) guidance system for tactical air-launched missiles. Study tasks include mission definition, system requirements, and technology assessment/laboratory demonstration activities to reduce development risk. Several design concepts will be generated before a single concept is selected for more detailed design and performance analyses. A hardware development plan will culminate the contract, which is scheduled to lead into a follow-on hardware demonstration phase. Mark Dorian was the proposal manager and Dennis Lambell is the program manager.

Get Ready: Santa Maria Barbecue on The Way

The annual Santa Maria Barbecue in Missile Park sponsored by the Convair Space Programs organization is three weeks away, but you can start getting ready now for the big day. Mark your calendar for Saturday, September 10, and tell your spouse, your children, and your friends about the delicious beef, beans, and bread; the western dancing with free lessons, bingo, raffles, children's rides, and games. As the sponsor for this event, I invite you all to come and enjoy a day of fun and good food. Tickets will go on sale soon.

W.F. Rector III
Division Vice President
Space Programs

Convair Hosts Visitors Week of August 8



Photo 1: Congressman Joseph Addabbo (D-NY) visited Convair for a cruise missile overview. He is pictured here with Mike Keel, division vice president—Cruise Missiles; Don Wilson, manager—Avionics Final Assembly; and Dave Berry, supervisor—Final Assembly. **Photo 2:** Maj. Gen. William A. Gorton (right) toured Avionics Manufacturing and Test during his visit. General Gorton is the Director of Operational Requirements for the Air Force. Jim McIntyre, Operations general supervisor, and Dick Thomas, MRASM marketing manager, accompanied him during that part of the tour. **Photo 3:** Donald C. Latham, undersecretary for defense (second from right), toured the Tomahawk Final Assembly area. With him are Dave Berry; Ed Squires, division vice president—Cruise Missiles Operations; and Carey Riley, SLCM marketing manager.

Best Wishes to the July Retirees

Convair's thanks and best wishes to these people who retired in July.

Name	Department	Years of Service
Charles Amedeo	979-4 Group Leader	25½
Jean Bartle	359-0 Insp-Receiving & Shipping	26
S. Ben Belfiore	675-0 Design Drafter	5
Joe Butera	032-0 Mfg Ops Supervisor	40
Robert M. Cash	617-0 Sr Engineer	31
James L. Cortez	455-0 Mfg Engineer Specialist	43½
Thomas L. Cross	427-0 Mfg Engineer Specialist	15
William J. Crover	267-0 Logistics Spt Prt Analyst	35½
Clyde L. Glasson	617-0 Engineering Specialist	34
Ona M. Goins	463-1 Tool Crib Attendant	23½
Charles V. Hawks	038-0 Elec Tech-Space Sys	26
Patricia R. Jacobsen	193-3 Accounting Analyst	27
Edward J. Johnson	431-0 Sr T&O Planner	18½
Joseph L. Lackovic	455-0 Jig & Fixture Builder	11
William F. Luster	679-0 Engineering Specialist	17
William T. Palmer	015-0 Milling Machine Operator	4
Edward F. Quinn, Jr.	603-0 Sr Structural Engineer	31
Walter L. Smith	626-0 Group Leader	27
Elaine J. Terry	196-2 Transp Reservationist	25
Clair L. Wadding	979-4 Insp-Launch Svcs FnL Elec	25

Learning Opportunities

NMA Convair Chapter learning opportunities are open to all Convair employees. For more details about NMA courses and seminars, read the *Educational Bulletin*, published monthly by Educational Services.

- Challenge of a New Employee.** First-line supervisor course 6. Seven-week course begins Thursday, September 8, at KM. Call George Brown, ED 6202, or Jane Duby, LF 8003.
- Counseling.** First-line supervisor course 7. Seven-week course begins Wednesday, September 7, at KM. Call Jane Duby, LF 8003.
- Managerial Objectives.** Four-week course begins Thursday, September 8. Call Gary Kranz, KM 6577, or Jane Duby, LF 8003.

- Speechcraft.** Eight-week class on public speaking begins Wednesday, September 7. Call Connie Gruber, KM 6606, or Bill Baer, KM 2411.

El Cajon to KM Vanpool Openings

Convair's vanpool, servicing the 7:30 a.m. to 4:15 p.m. shift, has two openings for employees who commute to Kearny Mesa from the East El Cajon, Parkway Plaza, or Grossmont areas. Call Carl Wannamaker, KM 1089, for information and reservations.

Balboa Branch Library Book Sale

The Balboa Branch of the San Diego Public Library will hold a book sale from 9:30 a.m. to 3:30 p.m. on Saturday, August 27. Included in the sale are textbooks, computer programming materials, and encyclopedias, which might be of interest to Convair employees who are furthering their education. Cash or personal checks will be accepted, and all proceeds go to benefit the library. The Balboa Branch is located on Mt. Abernathy, just off Balboa Avenue in Clairemont.

Health Fitness Center News

- Wellness Sweepstakes** — August 1-31. Stop by the HFC for Wellness Sweepstakes contest rules.
- HFC Wellness Special** — August 1-31.
 - 10% discount to all new HFC members.
 - Free nostalgia T-shirts to the first 100 new members.
- Yoga** — A five-week session begins at 4:45 p.m. on Tuesday, August 23, in Missile Park.
- Rock-A'-Robics** — A free class on Tuesday, August 30, at 4:30 p.m.

Employment

For the week ending August 12, employment was 10,377.

STARS vs LIBERATORS: It's Close! The latest report from the bond drive coordinators as the *Weekly Log* was going to press last Friday was that the competition between Dan Da Pra's Kearny Mesa Stars and Ken Lake's Lindbergh Field Liberators is still too close to call. Departments achieving 100% participation are receiving special certificates to display in their areas. At the end of the campaign, all bond participants' names will go into a drawing for Charger season tickets, \$100 bonds, and reserved parking. If you haven't already signed up, there is still time this week to get your name in the drawing and boost your team to victory.

CONVAIR Weekly Log

August 29, 1983

Published by the Convair Division of General Dynamics



Boeing Strut Program Reaches Major Milestone. Pictured above are the crew members of the Boeing 767 strut assembly line along with the 160th strut delivered to Boeing. Strut 160 is the first strut to be assembled in less than 1,500 hours. This represents an improvement over 5,500 hours when compared with Strut 1, which took more than 7,000 hours to assemble. Front row, from left: Jose Saa, Renato Ambata, Betty Holloway, Richard Greene. Back row: Doug Prager, Dave Lucero, Tony Martinez, Ray Combs, Glen Eaton, Harold Peterson, Dick Rowe.

Convair's New CRAD

Energy Systems Awarded Contract. Lawrence Berkeley Laboratory has awarded Convair a contract to study the conceptual design for a unique superconducting magnet. The study is in support of a 20-TeV proton collider accelerator to be developed and built over the next ten years by the Department of Energy. The accelerator will be used by physicists doing research in the field of elementary particle physics. It will allow the internal structure of the proton to be examined, which will play an important role in determining the structure and interaction of matter.

To put the accelerator's size into perspective, picture a structure 31 miles in circumference and 10 miles in diameter — that diameter is the distance from KM to LF! This size is necessary because the accelerator requires 3,500 magnets, and each magnet and its cryostat will be 12 inches in diameter, 50 feet long, and will weigh approximately 15,000 pounds.

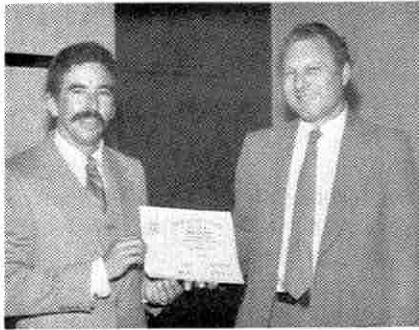
The ten-year program allows four years for magnet and manufacturing development, four years for magnet production, and two years for installation. The three-month study by Energy Systems Department is for a conceptual design and manufacturing plan plus a parametric cost estimate. Additional refinement studies are expected next year. Sam Ackerman is the program manager and Mike Kimmy is the study leader.

Convair Experiments To Fly on Eighth Shuttle Flight

The upcoming shuttle flight — STS-8 scheduled for August 30 — will be watched closely by people here for several reasons. Besides containing the Convair-built midfuselage, *Challenger* will carry two experiments built by Advanced Space Programs.

Winning Student Experiment. A Convair-designed and -built animal enclosure will carry six laboratory rats on STS-8. The animal enclosure module (AEM) was built as part of our sponsorship of a winning student experiment. Daniel Weber of New York City devised the AEM for a nationwide NASA/NSIA high school science project competition last year. Dan's winning entry is an experiment designed to investigate the effects of weightlessness on arthritis in rats and, by inference, in humans. Extensive ground testing by NASA has verified that the AEM can house the animals in relative comfort and prevent odors or contaminants from escaping into the crew cabin. This flight marks a final test of the AEM's ability to support healthy animals in a zero-gravity environment. The animals' reactions will be monitored and photographed by crew members during the flight. The final phase of Dan Weber's experiment is scheduled to fly on STS-11 next January. A second AEM student experiment will be conducted on a future shuttle flight, perhaps as early as STS-14 in May 1984. Tom Kessler, Advanced Space Programs, is the project leader for the hardware development and integration.

Solar Concentrator Mirrors. The eighth shuttle flight will carry three mirror samples for the General Dynamics solar concentrator to test their durability in the space environment. The samples were prepared using a novel, low-cost process that has the potential to greatly reduce the cost of space solar arrays. (A solar array is a device that converts solar energy to electrical energy for satellite use. The solar concentrator, a new generation of solar array, is designed to increase the power of the array.) The mirror samples were tested for reflectivity at Convair and Marshall Space Flight Center before delivery to the Kennedy Space Center. Following the flight, these samples will be returned for testing to determine their ability to withstand the space plasma (the atmosphere that envelops a body in space) and radiation environments. Data from this experiment will be used to determine a design and fabrication approach for the five solar concentrator modules set for delivery in 1984 under a contract from the Air Force Systems Command.



Norvell Freeman, Jr., Bill Ricketts, and Mike Lowell, recent graduates of the apprenticeship program, are presented with journeyman certificates by Norm Pearl, manager of Production Engineering. Freeman (left) and Ricketts (center) are now Senior Tool Designers, and Lowell (right) graduated as a Numerical Control Machining Programmer.

Quality Circles: Growing and Producing Results

Quality Circles are small groups of employees who meet one hour a week to solve work-related problems. Thirty-four circles are operating at Convair, and the goal is to have 50 by the end of the year.

767 Strut Program Includes QC's. In their continuing all-out effort to meet quality, cost, and schedule goals, the Boeing 767 Strut Program began a Quality Circle program for their entire area in July. Nine circles meet weekly in the 767 assembly area, including a circle consisting entirely of inspectors. The QC leaders in the 767 area are Bob Miller, Don Bates, Carlos Cruz, Wayne Davison, Bob Porter, Lloyd Ripley, Art Lintvedt, and Peter Keeping.

CCC Presents Cost-Saving Proposal. Composite Change Corps, the circle in Metalbond and Composites, made a presentation to management on August 11 that proposed work control boards designed to increase the efficiency of work control. The QC problem-solving process normally culminates in a presentation to management when a circle finds a solution to a problem they have been working on. The circle estimates that the proposal will produce \$185,000 in cost saving per year. CCC members are Napolean Alexander, Craig Jones, Michael Stubbs, Nancy Swanson, Guy Taylor, James Wiggins, Laura Ojeda, Carol Douthit, and leader Bobby Ratliff.

Convair Inventors Issued U.S. Patent

The U.S. Patent Office has granted Patent No. 4,393,541 to Ed Hujak, Department 953-0, and Hans Stocker, Department 691-0, for a self-locking hinge mechanism to be used in deployable space structures. This patent is Ed's fifth and Hans' first.

★ The Decision ★

The Winner Of The Competition and
The Winners Of The Great Prize Drawing
... will be announced next week!

Reminder: Security is Everyone's Job

Industrial Security wants to remind you to get authorization from their department before processing Department of Defense classified information on computers, word processors, or memory typewriters. If your electronic equipment can read, display, store, or produce material, contact Industrial Security at KM 1471 for authorization.

Professional Development Opportunities

NMA Convair Chapter learning opportunities are open to all Convair employees. Information about NMA courses and seminars, also appears in the *Educational Bulletin*, published monthly by Educational Services.

- **Personal Skills for the Manager.** Eight-week course begins Tuesday, September 6, at KM. Call Art Drown, LF 5780, or Julian Jaeger, LF 5912.
- **Challenge of a New Employee.** First-line supervisor course 6. Seven-week course begins Thursday, September 8, at KM. Call George Brown, ED 6202, or Jane Duby, LF 8003.
- **Counseling.** First-line supervisor course 7. Seven-week course begins Wednesday, September 7, at KM. Call Jane Duby, LF 8003.
- **Managerial Objectives.** Four-week course begins Thursday, September 8. Call Gary Kranz, KM 6577, or Jane Duby, LF 8003.
- **Speechcraft.** Eight-week class on public speaking begins Wednesday, September 7. Call Connie Gruber, KM 6606, or Bill Baer, KM 2411.
- **New Age Thinking.** Thirty-hour seminar begins September 6, at 5:00 p.m. at Lindbergh Field. Call Mark Schwartzel, KM 3218, or Judy Braun, KM 6606.

From the Health-Fitness Center

Final Three Days of the Wellness Sweepstakes. Win 1983 Charger season tickets, tickets to the 1984 Olympics, and more! Contest rules available at the HFC.

Wellness Month. Free T-shirts and 10% discount on registration fees to all new HFC members who sign up during August.

Rock A' Robics. Free classes at 4:30 p.m. on August 31 and September 1.

Working with People You Dislike. September 1, Missile Park bandstand, 5:00 to 7:00 p.m.

WORKOUT. New session runs from September 1 through October 12. Free introductory class on September 7, at 4:30 p.m.

Passages. Missile Park pavilion, September 13, 4:45 to 6:15 p.m.

Health-Fitness Center members receive discounts on all programs. For more information, call the HFC at KM 3567.

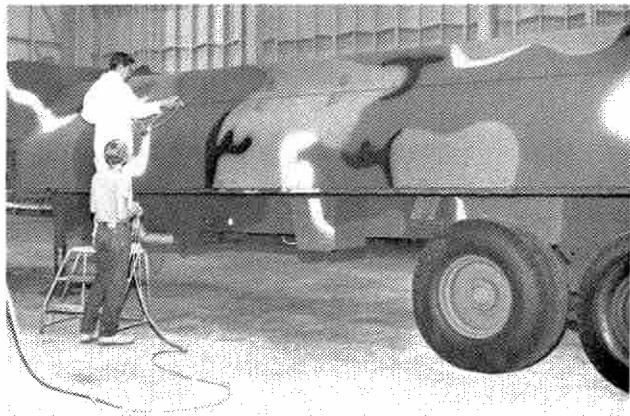
Employment

For the week ending August 19, employment was 10,414.

CONVAIR Weekly Log

September 6, 1983

Published by the Convair Division of General Dynamics



John Morales puts some finishing touches on a TEL with the help of Rob Hamlin at the Lindbergh Field paint shop.

Painters at Lindbergh Field Produce Unique Masterpieces

The people in the paint shop at Lindbergh Field have been putting in a lot of extra effort lately to support the GLCM production schedule. One of the masterpieces they create is the camouflage paint job on the transporter-erector-launcher (TEL) and the launch control center (LCC), which is the last operation performed before the equipment is delivered to the customer.

Camouflage painting is done with four colors: forest green, field drab, sand, and black. The painters work from black and white drawings of the camouflage design with numbered areas on the drawing corresponding to the four colors. After forest green is put on, they lay down quarter-inch tape in the outline of the design and spray on a small amount of primer over the tape. When the tape removed, the outline of the camouflage design remains — in effect, creating a very large paint-by-number project.

Each painter works freehand with a spray gun, one color at a time. Forest green goes on first, then field drab, sand, and black. The order is important because each successive color takes care of overspray. Normally, it takes 4½ days to paint one TEL, including preparation, painting, and drying.

Visitors Welcomed at Convair

James F. McGovern, staff director and chief counsel, Senate Armed Services Committee, was here on August 25 for an overview of Convair programs. General Manager John McSweeny was host . . . On August 29, Alan C. Chase, visited Convair for a tour and briefing on the GLCM program. Jerry Butsko, GLCM program director, was the host. Chase is a staff member of the House Armed Services Committee . . . Robert Seraphin, staff assistant for the Subcommittee on Defense, House Committee on Appropriations, visited Convair on August 29 for an overview of Convair programs. He was hosted by Mike Keel, division vice president of Cruise Missiles.

Atlas/Centaur Impresses SCUC 83

Convair emphasized the commercial availability of Atlas/Centaur at the 1983 Satellite Communications User's Conference (SCUC) in St. Louis two weeks ago. Over 3,500 conference participants viewed the displays of nearly 100 companies and attended three days of panel discussions and presentations concerning the growing field of satellite communications. Donna Clark, Rudy Romero, and Bill Scheck discussed Atlas/Centaur commercial launch services with potential customers and other interested parties. Roger Lynch, director - Space Programs Office, and Dr. Nat Cohen, senior engineering specialist in Advanced Technology, were on panels that discussed the space transport industry and satellite technology trends. Dr. Cohen also participated in a video teleconference with Prime Minister Seaga of Jamaica.

Convair's display at SCUC, which included enlarged color photos of 60 launches, proved to be extremely valuable in demonstrating that Atlas/Centaur is indeed available to the communications satellite user community.

STS-8 Launch Lights Florida Skies

The first night launch of the space shuttle *Challenger* took place at 2:32 a.m., EDT, Tuesday, August 31. According to Doug Heydon, who was among the Convair attendees, the launch provided an awesome spectacle for the thousands of onlookers. Light from the exhaust plumes of the two solid rocket boosters (SRB) created an early sunrise as Challenger rose in its eastward flight trajectory.

The launch was delayed for 17 minutes from the planned time of 2:15 a.m. while careful checks were made of the cloud cover in the vicinity of the Kennedy Space Center, in case of a possible launch abort and landing. Rain and lightning had been quite heavy up until shortly before the scheduled launch time. While some clouds remained in the area, the viewers had no trouble tracking the shuttle until well past SRB burnout, to end a truly spectacular sight.

Convair, which builds the orbiter mid-fuselage, was represented by Heydon; Lloyd Munson, OMF program manager; Bill Phillip, Atlas program director; and Tom Hicks, Commercial Space.

Savings and Stock Plan Values for July

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.6184	\$ 3.0351	\$ 3.4788
Diversified Portfolio	2.1407	1.8749	3.1727
Fixed Income	1.2274	1.3659	1.5295
Hourly			
Government Bonds	2.6154	3.0325	3.4768
Diversified Portfolio	2.1875	1.9129	3.2385
GD Stock	\$28.7500	\$29.5000	\$53.6250



1983 U.S. Savings Bond Campaign Results

The results are in, and it's the best bond drive in years. Spirited competition produced 93.2% overall participation for Convair Division. The final score: 93.27% for Kearny Mesa, Sycamore Canyon, Mission Plaza, Seville Plaza, and Eastern Test Range; 93.12% for Lindbergh Field, Harbor Drive, Plant 19, and Vandenberg.

The winners of the drawing in the 1983 U.S. savings bond campaign and the campaign co-chairmen are pictured above (front row, l to r): Yolanda Kennaly, Dept. 808, reserved parking; Shirley Elson, Dept. 031, two 1983 Charger season tickets; Wanda Wright, Dept. 190, \$100 U.S. savings bond; Ken Lake, co-chairman — Lake's Liberators; David Cook, Dept. 111, \$100 savings bond; Floyd Branscom, Dept. 808, reserved parking; Richard Conboy, Dept. 637, reserved parking. Top row (l to r): Dan Da Pra, co-chairman — Da Pra's Stars; Greg Brown, Dept. 251, \$100 savings bond; Tom Scanlan, Dept. 761, reserved parking; Ping Gordo, Dept. 432, reserved parking; Dan Gonzales, Dept. 190, \$100 savings bond.

From the Health-Fitness Center

WORKOUT. Free, introductory class on September 7, at 4:30 p.m. New session begins that day and runs through October 12.

Passages. Life-transition workshop on September 13, from 4:45 to 6:15 p.m. in the Missile Park pavilion.

Back Care. Two informative programs scheduled for September.

- Seminar: September 20, KM trailer 1, from 4:45 to 6:15 p.m.
- Class: Four sessions, September 27 through October 6, 4:45 to 6:00 p.m. in CRA clubhouse room A.

Health-Fitness members receive discounts on all programs. For more information, call them at KM 3567.

Another KC-10 Fuselage Delivered

Fuselage 401 for KC-10 No. 23 was delivered to Douglas Aircraft Co. in Long Beach on August 31.

Santa Maria Barbecue This Weekend

The Chuckwagon Gang from Vandenberg is bringing their famous Santa Maria beef to Missile Park on Saturday, September 10, for the Space Program's annual barbecue dinner. At last year's prices of \$5 for adults and \$2.50 for children under 12, you can't beat the deal. The fun starts at noon and dinner will be served from 3:00 p.m. until everyone has eaten. **Activities All Day:** Horseshoe and volleyball tournaments, bingo, and games for the kids. **C&W Dancing:** Music provided by the Blue River Band with two dance instructors. **The Dunking Machine:** Twenty-five cents will buy you three chances to dunk Bill Rector, Marty Winkler, Don Kolesar, Dave Cormany and others. **Raffle:** Dinner for two at a number of San Diego restaurants including Elario's and The Rheinlander, two PSA airline tickets to Las Vegas, and many more great prizes will be raffled off! **Tickets:** All Convair employees, their families, and friends are invited. You can get tickets for everyone from NMACC boosters. **Hurry:** Only 1,400 will be sold.

PLFCU Announces Reduced Loan Rates

New rates are available on loans for new cars, trucks, and travel trailers through the Point Loma Federal Credit Union:

APR*	Max. Term	Financing
12.8%	60 months	100%**
12.0%	48 months	80%†
11.0%	36 months	70%†

*Annual percentage rate. (Rates subject to change.)

**Excluding tax and license.

†Including tax and license.

Find Your Treasure at LF Salvage Sale

The employee stores sale is a handyman's delight. If you are the kind of person who can see a planter in a fiberglass nosecone, hurry on down to the Lindbergh Field salvage yard on Saturday, September 10. The sale lasts from 8:00 a.m. to noon. Items available include building materials, wooden racks, light bulbs, $\frac{3}{4}$ -inch plywood racks, desks, chairs, paint, wood, and scrap metal. Only employees (with identification badges) and retirees (with identification cards) and those accompanying them will be permitted access. Because of our plant safety regulations, no children under 15 or pets are allowed, and no open-toed or canvas shoes may be worn.

NMA Convair Chapter Tours

Tour Children's Hospital. A 60-minute tour of the Children's Hospital and Health Center, sponsored by the NMACC, will start at 5:00 p.m. on Thursday, September 22. The touring group, limited to 30 people, will visit the speech and hearing department, motion analysis lab, new surgical lab, and radiology and day surgery facilities. For details and reservations, call Sheila Caruso at KM 6496.

Coming October 8! Tour the submarines *Guitarro* and *La Jolla*. Details will be announced later.

Employment

For the week ending August 26, employment was 10,466.

CONVAIR Weekly Log

September 12, 1983

Published by the Convair Division of General Dynamics

Contract Funding Is a Long Process

Have you ever wondered how Convair gets the funding for ongoing defense contracts? Tomahawk, for example, is funded separately each fiscal year through a long process that involves over 30 legislative steps.

It begins with budget submission by the president. Tomahawk is only one small part of the entire federal budget for the fiscal year, and to establish it as part of the budget means gaining approval at each of these steps: (1) Defense Subcommittee of House Budget Committee, (2) House Budget Committee, (3) vote of full House of Representatives, (4) Defense Subcommittee of Senate Budget Committee, (5) Senate Budget Committee, (6) vote of full Senate, (7) Conference Committee to compromise differences, (8) House vote on committee bill, (9) Senate vote on committee bill, (10) president signs budget into law.

That's not the end. The same ten steps are repeated — through the appropriate subcommittees of the House and Senate Armed Services committees for specific authorizations, and again through the cycle for the House and Senate Appropriations committees. The Secretary of Defense or his Armed Services staff members are called to testify before Congress to defend their requests. Only after the appropriations bill is signed into law can the Office of Management and Budget release funds to the Department of Defense, the DoD release funds to the armed services, the services release funds to the contracting agency (the Joint Cruise Missile Project, in the case of Tomahawk), and the contracting agency release the initial funding to contractors. The entire process can take about 18 months from proposal to final contract.

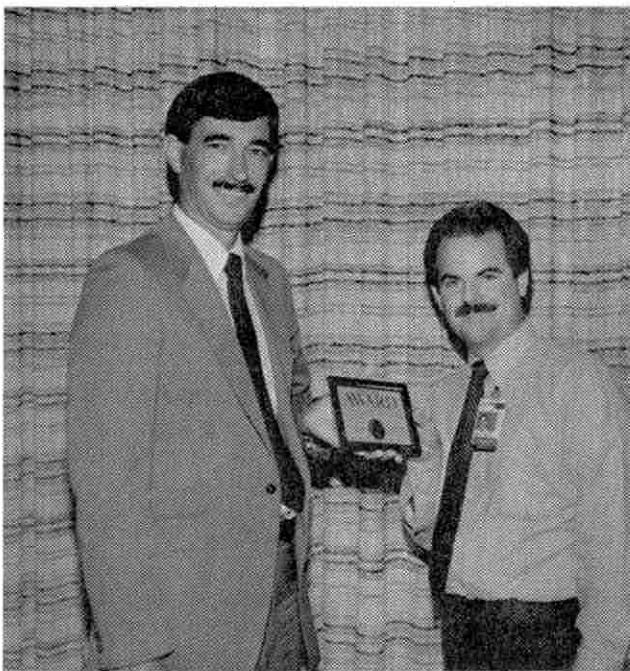
Sometimes the *Weekly Log* gets questions from employees about why they read news of contract awards in the paper before they hear about it here. The reason is that by Department of Defense regulation, all announcements of major contracts and programs are made in Washington by the DoD. We cannot make an announcement before this official announcement. By regulation and custom, senators and representatives from the affected districts are given a one-day advance notice of the award. Thus, the first announcement is almost always made to the media by the congressman's office. Readers of the *San Diego Union* may recall that several weeks ago news of \$6.7 million for the Tomahawk contract was announced through Congressman Duncan Hunter; that money was actually a part of SLCM funding for fiscal year 1983.

What's happening in Washington now? Congress is in recess until September 15, and Tomahawk is about halfway through the legislative process, having just come out of the Conference Committee of the House and the Senate Armed Services Committee. The next step is the House and Senate vote on the compromise authorization bill. This is funding for fiscal year 1984, which begins October 1.

Eleven Tomahawk Vehicles Delivered in August

Nine production Tomahawk vehicles were completed and delivered during August: six production GLCMs and three production antiship vehicles. One of the anti-ship vehicles was modified for use in a TASM flight test from USS *La Jolla*. The six GLCMs bring our total GLCM production deliveries to 25 and put us five vehicles ahead of contract requirements.

In addition to the production deliveries, two land attack nuclear test vehicles were completed during August. One was delivered to USS *La Jolla* for flight test and the second is in storage, pending delivery instructions.



Leading the way in Employee Suggestion awards for August is Dan Thompson (right), a buyer in Procurement, who proposed a less expensive material to fabricate part of the KC-10 door assembly. His supervisor, Bob Mitchell, presented the award. Dan received \$8,409 for his cost saving idea.

CELEBRATE LIFE

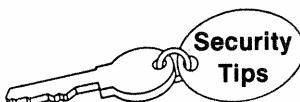
Give Blood
During
Convair & Western Center Blood Drive
October 3 through 7, 1983
"Celebrate Life" Rainbow T-Shirts
Will Be Given to All Donors
Reservation Details Next Week

Employee Suggestions Institutes Changes

The Employee Suggestion program is implementing changes that are producing positive results. In the last three months, analysts have reduced the backlog of suggestions by 50 percent. The goal is to completely eliminate the backlog by the end of the year and to ensure that no suggestion in the system is more than 75 working days old. Analysts have developed and are using computer reporting systems to track E.S. paperwork. In addition, the E.S. and Cost Reduction Program boards have been combined so that response to cases heard before the board is quicker. (Board cases involve savings of \$5,000 or over.)

In August, a total of \$19,707 was awarded to Convair employees for their suggestions. Seventy-one employees were awarded \$100 or less and the following 29 employees have received awards of \$100 or more.

Name	Dept	Amount (\$)
M. Barba	431-0	266
A. Bonillas	232-0	372
H. Bratt	455-0	141
R. Brent	341-0	206
L. Brooks	653-0	486
V. Cole	038-0	223
Y. Corder	038-0	103
T. Cullinan	015-0	136
L. Faast	561-0	578
R. Hall	355-0	270
D. Holba	067-0	230
P. Kirchmaier	612-0	455
D. Larson	340-0	200
L. Lenkiewicz	679-0	992
R. Marx	626-0	576
N. Mendoza	031-0	636
E. Millar	985-3	175
J. Mitchell	197-1	1,276
O. Mitchell	028-0	197
I. Mouet	049-0	139
V. Passmore	043-0	134
T. Raistrick	461-0	207
R. Reekers	350-0	140
F. Schrosk	015-0	143
W. Smith	038-0	400
L. Taylor	038-0	220
H. Teel	756-0	114
D. Thompson	810-3	8,409
G. Tompkins	835-1	821

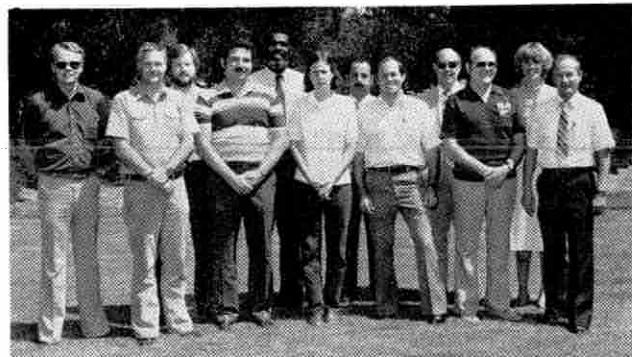


The amount of Department of Defense (DoD) material with secret and confidential classifications, received and generated under contractual commitments, is rapidly increasing. If you work with classified documents, remember that combinations to security containers must be changed on a regular basis to ensure compliance with DoD security criteria.

- The combinations to all security locks must be changed when anyone who knows the combination transfers or terminates employment.
- In addition, security combinations must be changed every 12 months, except for security containers that store NATO-classified material.

- Combinations to security containers that store NATO information must be changed at six-month intervals, or when anyone terminates or transfers.
- Cipher locks, used to control access into classified areas, must be changed every 90 days.
- Keep a record of combination changes on file.

Contact the locksmith at KM 1685 or LF 8648 if your combination is due for a change.



QC Leader Training Graduates. The August Quality Circle leader training graduates were the first to receive college credit. Pictured above are, front row, l to r: Bill Coddington - DCAS, Peter Caswell - DCAS, David Snow - DSD, Lauren Brown - Transportation (Pl 19), Mike Sinnott - Transportation (KM), Bill Woods - Machine Shop, and Dick Neal - QC program. Back row, l to r: Jim Adams - DSD, George Robinson - QC program, Al Calabrese, Jr. - Production Avionics, George Vollmer - Tool Design, and Roberta Baade - QC program. Convair's program is one of the few in industry to offer college credit for this training.

The Convair Quality Circle program was pleased to share its August leader training for supervisors with people from Defense Contract Administration Services (DCAS) and Data Systems Division. The next leader training for supervisors will be held September 20 and 21. (These dates have been changed from the dates published in September's Educational Bulletin.) Call Roberta Baade, KM 2256, to find out about enrollment.

From the Health-Fitness Center

- **Passages.** Missile Park Pavilion, September 13, 4:45 to 6:15 p.m.
- **Back Care — Seminar:** September 20, 4:45 to 6:15 p.m., KM trailer 1. **Class:** September 27 through October 6, four sessions, 4:45 to 6:00 p.m., CRA clubhouse room A.
- **Working with People You Dislike.** September 13 and 15, 4:45 to 7:45 p.m., CRA clubhouse room A.

Health-Fitness Center members receive discounts on all programs. For more information, contact the Health-Fitness Center at KM 3567.



The Search Goes On!
Keep Your
Eyes Open for Great Talent!

Employment

For the week ending September 2, employment was 10,517.

Weekly Log

September 19, 1983

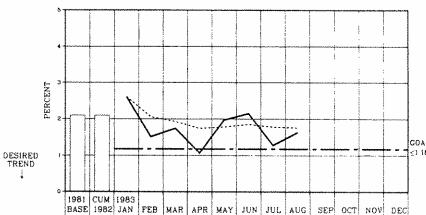
Published by the Convair Division of General Dynamics

Quality Awareness

QIP Update

Last spring the *Weekly Log* ran a series on the 12 charts contained within the 18 Quality Improvement Program displays located around the division. As you recall, QIP is a corporatewide program to improve the quality of General Dynamics products. The 12 charts track quality indicators such as scrap, rework, yield, percentage of purchased lots accepted, deviations and waivers, inspection escapes, and overtime. Data for the first eight months of 1983 has been accumulated, and with this issue the Log resumes its update of each QIP chart.

Scrap



Scrap is nonconforming material that is not usable and cannot be economically reworked or repaired. Excessive scrap causes program overruns and schedule slippages. The chart measures actual hours spent on scrapped parts as a percentage of the total manufacturing direct labor hours. Our goal is to reduce scrap to a year-to-date average of not more than 1.18 percent. The dotted line represents the year-to-date average for the first eight months of 1983.

Configuration Management Course Starting Soon

The eleventh course in configuration management will start on September 27. This course is designed to provide engineers and support people with an understanding of configuration management, a practical management discipline for ensuring that customers get products that meet their requirements. Call Tom Samaras, KM 2492, for reservations.



Santa Maria Barbecue. The BBQ team from Vandenberg had their hands full on Saturday, September 10, when they served 1,500 picnic-goers 1,600 pounds of top sirloin steak, 60 gallons of beans, and 56 gallons of potato salad! Everyone enjoyed the Blue River Band. The dunking machine, used for the first time this year, was a big success and all proceeds went to beef up the NMACC scholarship fund.

Value Engineering Workshop

Each year, Convair offers two or three workshops that are designed to develop the skills and techniques involved in the concept of Value Engineering. Classes are organized into eight separate teams, each consisting of two engineers and three people representing a cross-section of functional disciplines within Integrated Logistics Support, Quality Assurance, Operations, and Estimating. Each team works on a realistic project provided by current Convair programs.

Since the early 1950s, Convair has continually maintained a training effort to ensure that expertise gained through Value Engineering is maintained within the work force. The need for such expertise, and use of the skills and techniques to manufacture quality products at the lowest possible cost, continues to be important to Convair and its customers.

Departmental quotas for the forthcoming workshop have been distributed. If you are interested, and currently in a position where such skills can be utilized, see your supervisor. The workshop is scheduled for October 17 to 28 (7:45 to 11:45 a.m., daily) in the CRA clubhouse.

Data Management Course Graduates

Configuration Management department members recently completed a five-day seminar taught by Charles F. Feely, a data management specialist and associate professor at the Air Force Institute of Technology. The course covered the management of all data and information contractually acquired by the government from Convair. Certificates were issued to Marianne Andres, Kelly Clark, Isabela Cuerpo, Pat Donaldson, Roger Espineli, Tommy Johnson, Jeff Lepore, Hank Miller, Joe Owens, Kathy Pease, Gary Prettyman, Linda Radwanski-Roy, Karan Talada, Scott Williams, Paul Willis, Don Zech, Mark Uyeda, Jim Boyer, Tom McLennan, Ski Wolniewicz, Ann Kilstofte, and Vince Valdez.

Notice to all Convair employees taking classes at Mesa College: Classes will be cancelled on September 19 in observance of Admissions Day.



The Lee Cox family: Barbara, Bronwyn, Lee, and Brandon. Lee is an Inspector in Department 979-4.

Eastern Test Range Participates in NASA Picnic

The Lee Cox family was chosen to be the representative Convair family at the special "Lunch with Vice President Bush" event during the NASA Labor Day picnic. The picnic is an annual event for all NASA contractor employees and families. Over 14,000 people attended the picnic this year at Kennedy Space Center in Florida. It took 900 volunteers to make the day possible. A special committee from Convair that included John Mazza, Pat Whisenant, Frances James, Digger Ljungquist, and John Boerlin manned a special booth at the picnic. Gerald Schmitz's daughter Kyla received Vice President Bush's autograph when she answered "yes" to his question about whether she was going to be an astronaut. (She was wearing an Atlas/Centaur cap!) Gerald Schmitz is a launch services mechanic in Department 979-1.

Reminder to all ETR employees: The annual picnic is coming up on October 16.



Apprentice to Journeyman. Jim Haile (right) recently graduated from the apprenticeship program as a Tool and Die Maker. Presenting Jim with the journeyman certificate is Jim Cortes, Operations general supervisor.

Celebrate Life

Make a Reservation to Donate Blood

Beginning today, reservations can be made to donate blood during the Convair and Western Center Blood Drive the week of October 3.

All employees benefit from the Convair Reserve Fund by either a reduced processing fee or no fee at all (depending on your insurance coverage). There is never a charge for units of blood used for Convair employees or dependent family members.

The San Diego Blood Bank will conduct the blood drive. It is the only supply source for all 30 San Diego County hospitals, and donations of 300 pints a day are needed to meet the community's needs.

Make your reservation early to donate blood and receive a rainbow "Celebrate Life" T-shirt to wear with pride. Reservations should be made according to plant location.

Kearny Mesa (KM 1811 for reservations)

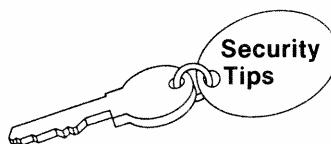
- October 3, 8:00 a.m. to 3:00 p.m.
- October 4, 8:00 a.m. to 1:00 p.m.

Lindbergh Field (LF 8244)

- October 5 and 6, 8:00 a.m. to 1:00 p.m.

Plant 19 (LF 8244)

- October 7, 9:00 a.m. to 4:45 p.m.



The number of visit requests being processed by the Security Department is on the rise. Visits to other facilities must be planned ahead to allow sufficient processing time here and at your destination.

- Some facilities require one week, from the date of receipt, to process visit requests.
- Allow a minimum of 10 to 20 days for processing visit requests that are related to potential subcontractors or established contracts.
- Visit requests that require a contracting officer's need-to-know certification need 20 days or more processing time.
- Visits to Department of Energy facilities should be submitted 30 days in advance.
- Check with the Security Department about foreign visits.

Tour the Guitarro and La Jolla

Two 90-minute tours of USS *Guitarro* and USS *La Jolla*, the submarines used in the Tomahawk test program, have been arranged for Saturday, October 15. The tours are sponsored by the NMA Convair Chapter. The tours are open to all General Dynamics employees and families, but are limited to 50 people (25 people in the morning tour and 25 in the afternoon tour). For details and reservations, call Sheila Caruso, KM 6496, or Brent Harritt, KM 6478.

Reminder to the Children's Hospital touring group: Meet at 5 p.m. in the lobby of Children's Hospital on Thursday, September 22. Children's Hospital is located at Highway 163 and Genesee (next to Sharp Hospital).

Save Gas — Join a Vanpool

Lindbergh Field employees who live in Poway have a chance to join a vanpool. The vanpool will operate for first-shift employees — 7:30 a.m. to 4:15 p.m. — and will park in the flight line parking lot. On the way in and out of Lindbergh Field, the van will also stop at Mira Mesa Park & Ride. Call Doug Wenberg, LF 6518, or Ben Wheat, LF 5922, to sign up.

Comiso, Sicily Job Opportunities

Job openings for the GLCM Interim Contractor Support team in Comiso, Sicily, are still available for electronics engineers, field service technicians, quality assurance inspectors, and supply support personnel. Consult your nearest PEP bulletin board for details.

From the Health-Fitness Center

• Back Care — Seminar. September 20, 4:45 to 6:15 p.m., KM trailer 1. **Class.** September 27 to October 6, four sessions, 4:45 to 6:00 p.m., CRA clubhouse room A.

• Shape Up. Harbor Island class begins October 10, at 4:45 p.m. (note the new time). Kearny Mesa class begins October 10, at 4:30 p.m. Both are seven-week classes and end on November 22.

Health-Fitness Center members receive discounts on all programs. For more information, contact the Health-Fitness Center at KM 3567.

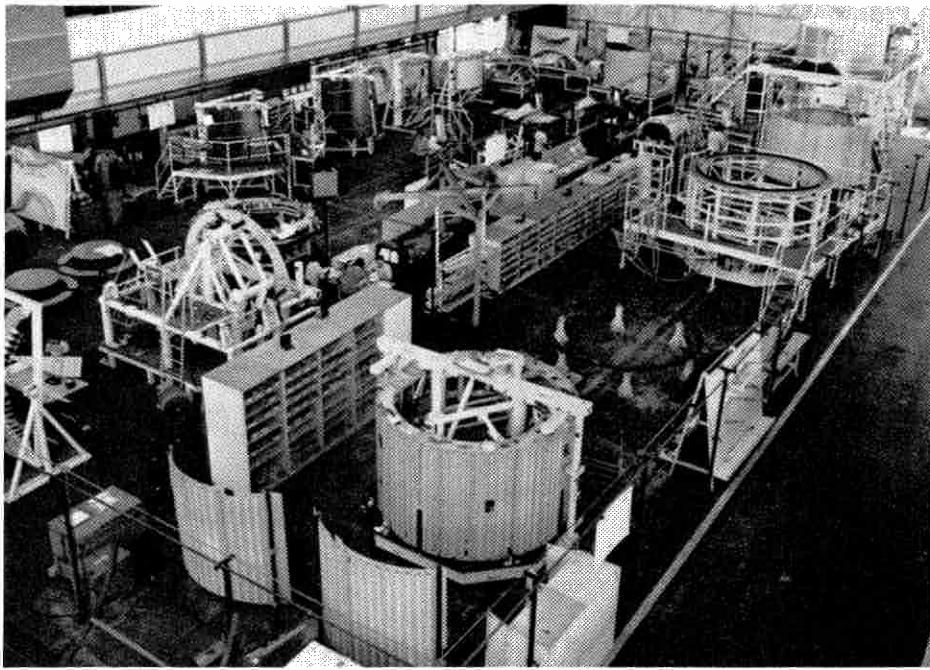
Employment

For the week ending September 9, employment was 10,550.

CONVAIR Weekly Log

September 26, 1983

Published by the Convair Division of General Dynamics



Five thrust sections are on the production line at Plant 19 Atlas/Centaur subassembly area. The Department 759 people have not seen this many units at one time for many years. The schedule pickup is a result of great effort by and the department and their support groups to meet production goals. To gain perspective on the size of the assemblies, look for the Department 759 employees in the middle of the photo. The bare spot at the middle right is where the fifth unit is just beginning to be set up. From here, the thrust sections are shipped to Kearny Mesa for final assembly.

General Dynamics Merit Scholarship Program

Each year, up to four General Dynamics-sponsored scholarships are awarded to children of employees. Eligibility is twofold: employees must have completed two years of continuous service by the end of the year before the award; and their children must take the Preliminary Scholarship Aptitude Test/National Merit Scholarship Qualifying Test (PSAT/NMSQT) during their junior year. The test is given in October in both public and independent high schools at a cost of \$4.50. Additional information is available in a booklet at Educational Services, Kearny Mesa building 17, or from Bob Rix, KM 2236.

ISPA Workshop Held at Convair

The Southern California Chapter of the International Society of Parametric Analysts (ISPA) held a skills workshop here on September 20, hosted by Contracts and Estimating. ISPA is a professional society

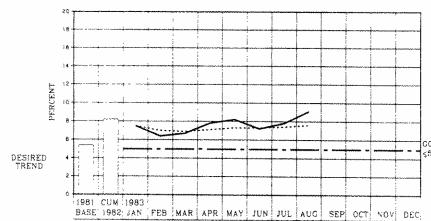
dedicated to the improvement of estimating techniques through statistical means. Over 50 attendees heard presentations by Clyde Perry, General Dynamics corporate pricing director; Ted Parsons and Michael Simon of Estimating; Bea Grossman and Wayne Stanley of Pomona Division; and by other ISPA members. The workshop included presentations on Atlas/Centaur and Tomahawk by Tom Hicks and Kent Parra and a tour of Atlas/Centaur final assembly areas. For information on membership and future activities, contact Jim Fox at KM 3310.

Quality Awareness

QIP Update: Overtime

The overtime chart tracks the division-wide total overtime hours as a percentage of straight-time hours (both direct and indirect). QIP guidelines are clear about excessive overtime contributing to higher energy use, personnel inefficiency and fatigue, management problems, and poor communication — all quality inhibitors. The QIP goal is to hold overtime to a 5% level. Our chart shows that we started with a cumulative overtime total of 8.2% for 1982. So far, overtime is up to 9.1% in August, for an overall average of 7.6%.

Overtime



New CRAD for Convair Structural/Absorbing Fiber Development

The U.S. Air Force Systems Command has awarded General Dynamics Convair Division a contract to develop and demonstrate new types of fibers capable of being used in composites for making advanced air vehicle structures. Use of the developed fibers would allow fabrication of more survivable, lighter weight, and stronger composite structures at a lower cost. Dr. Jay Toor, Department 685, is the program manager.

NMA-Sponsored Tours of La Jolla and Guitarro Booked Solid

Please, no more phone calls! The response to the notice of the tours of USS *La Jolla* and *Guitarro* was tremendous. The tours are sold out, and large waiting lists exist. The tour coordinators regret that they can take no more names.

A reminder to employees: Tours of the submarines are not available to the general public. This tour was arranged by the NMA Convair Chapter and they ask employees to refrain from calling the Navy directly as this may only hinder efforts to obtain future tours.

STILL TIME FOR BLOOD DONORS TO SIGN UP

Convair and Western Center employees can still "Celebrate Life" by making an appointment to donate blood the week of October 3. Active employee participation makes it possible to provide a no-charge replacement service to all employees and their dependents, as well as meeting the community's needs.

Rainbow "Celebrate Life" T-shirts will be given to all donors. Call now and make your appointment.

Place	Call for Reservations	Date and Time
Kearny Mesa Fire Station, building 6	KM 1811	October 3, 8:00 a.m. to 3:00 p.m. October 4, 8:00 a.m. to 1:00 p.m.
Lindbergh Field building 2, classroom 1	LF 8244	October 5 and 6 8:00 a.m. to 1:00 p.m.
Plant 19 First Aid Station, building 4 (trailer outside)	LF 8244	October 7, 9:00 a.m. to 4:45 p.m.

U.S. Patent Issued to Convair Engineer

The U.S. Navy has notified us that U.S. Patent 4,394,101 was issued to Convair engineer John Richer, Department 673-0. John conceived the patented design while working under a Navy contract. It involves a mechanism for locking cargo containers onto a carrier vehicle.

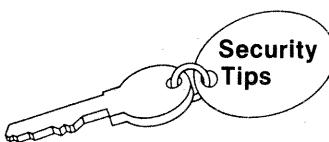
Dr. Dean Heads NMA Dinner Program

Dr. Michael Dean, the popular San Diego-area entertainer and hypnotist, is the featured speaker at the October 13 NMA dinner meeting at the San Diego Hilton International ballroom. Executive host for this event is Paul M. Cofoni, Director, DSD-Western Center. Convair General Manager John McSweeny is slated as the spotlight speaker. A no-host cocktail hour begins at 5:00 p.m., followed by dinner at 6:30 p.m. The program begins at 7:30 p.m. Tickets are \$9.50 for NMA members and \$15 for non-members. Purchase your tickets early — this meeting is sure to sell out soon.

The purpose of the Weekly Log is to inform employees about Convair products and the accomplishments of people. You can help by contacting the Weekly Log coordinator if you have ideas for stories. Call Julie Andrews at KM 6966 or send written material to MZ 33-1334.

PAs Must Have Delivery Instructions

Material Control reports that they are seeing a lot of Purchase Authorizations without delivery instructions. You can do them a favor by including your plant, building, column number, department, name, and extension on all direct, non-inventory PAs. This will ensure timely delivery for you and no logjams of material at Receiving Inspection. Receiving can no longer call people for delivery instructions, and PAs will not be processed if this information is not complete. When you consider that over 4,000 direct and 33,000 inventory PAs have been processed already this year, you can begin to understand the impact on delivery if PAs are not complete.



Security Tips

Access to security combinations or containers used to store NATO (North Atlantic Treaty Organization), CNWDI (Critical Nuclear Weapons Design Information), COMSEC (Communications Security), WNINTEL (Warning Notice: Intelligence Sources or Methods Involved), or other special access information must be restricted to appropriately briefed employees who have need-to-know. Department security representatives must ensure that security procedures in effect conform with these restrictions.

Professional Development

NMA Convair Chapter courses and seminars are open to all Convair employees. For more information, consult the Educational Bulletin, published monthly by Educational Services.

- **Effective Executive.** Begins October 12, and meets on three consecutive Wednesdays.
- **Communication Skills.** Seven-week first-line supervisor course begins Tuesday, October 18.
- **Practical Supervision.** Begins Tuesday, October 25, and lasts three weeks.
- **Interpersonal Skills for the Manager.** Eight-week certified manager course will meet on Thursdays beginning October 27.
- **Speechcraft.** LF Toastmasters Speechcraft course begins October 11, and runs for eight weeks.

From the Health-Fitness Center

- **Back Care Class.** September 27 to October 6, 4:45 to 6:00 p.m., CRA clubhouse room A.
- **Becoming a Non-smoker.** Five-session program begins October 5, from 5:00 to 7:45 p.m. in CRA clubhouse room C.
- **Shape Up.** Harbor Island class begins October 10, at 4:45 p.m. Kearny Mesa class begins October 10, at 4:30 p.m. Both are seven-week classes. Preregister by calling KM 3567.
- **Drug Education.** October 5, 4:45 to 6:45 p.m., in CRA clubhouse room C.

Health-Fitness Center members receive discounts on all programs. For more information, contact the Health-Fitness Center at KM 3567.

Sign Up for CPR Training

Registration is still open for cardio-pulmonary resuscitation training. A two-day session will be held on September 28 and 29, from 5:00 to 9:00 p.m. in the Kearny Mesa employee dining room. Attendance at both classes is required for initial or renewal of basic certification. The class is open to all General Dynamics employees, families, and friends. Call the KM Fire Station, KM 1811, for your reservation.

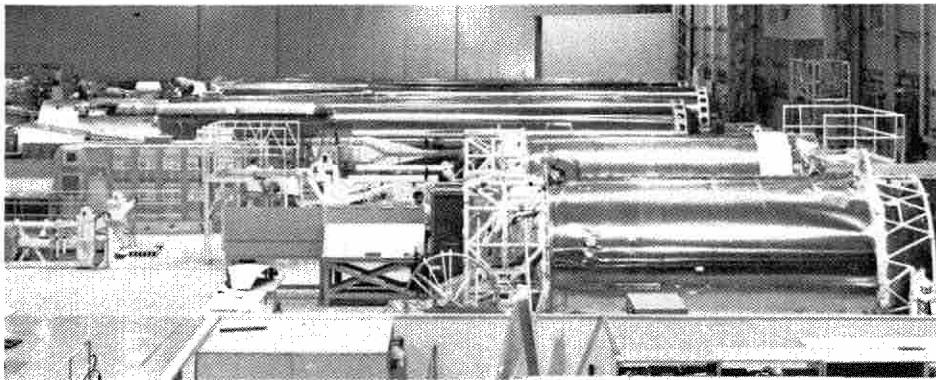
Employment

For the week ending September 16, employment was 10,591.

CONVAIR Weekly Log

October 3, 1983

Published by the Convair Division of General Dynamics



Just Like the Old Days! The increased activity is obvious at the Launch Vehicle Final Assembly area at Kearny Mesa as Centaur and Atlas vehicles begin to fill the docks in the south part of building 5. In the foreground are two Centaur upper stages. AC-63, an INTELSAT vehicle, has just started final assembly, and AC-62, another INTELSAT vehicle, is nearing completion. Farther down the line is Atlas 6003H, the third of the new H vehicles for the Air Force. The two Atlas vehicles behind 6003H are first stages for the Centaurs. Just out of sight at the far end of the photo is 6004H, in from Plant 19 where tank welding was performed. The pace in the area will increase even more as we approach 1984. Fabrication of the first Shuttle/Centaur vehicle, a test tank, will begin at Plant 19 and facilities changes will start in the high-bay area of building 5.



Convair Participates in Corporate Display at AFA

General Dynamics was among the many aerospace companies participating in the Air Force Association's annual meeting and display show in Washington, D.C., the week of September 13. The corporate display featured major Air Force programs from Convair, Fort Worth, and Electronics divisions. Among these were a full-scale, instrumented, two-seat

cockpit for the Fort Worth-built F-16. Visitors could "fly" the aircraft in a simulated environment. Convair had displays of our Ground-Launched Cruise Missile, Hard-Mobile ICBM, and Shuttle/Centaur programs. The photo above shows the large, one-tenth-scale model of Shuttle/Centaur with a satellite payload and the Tomahawk midbody (right off the production line) that drew considerable visitor interest.

Tomahawk Scores

On September 27, Tomahawk anti-ship missile T119 was launched from USS *La Jolla* and completed a successful flight test. The flight, which lasted 15 minutes, ended in target impact. This was the first of two anti-ship operational evaluation (OPEVAL) flight tests scheduled for the *La Jolla*. The second and final OPEVAL flight is planned for mid-October with missile T44, which is in final checkout at Kearny Mesa.



Service Award Breakfast

On September 23, General Manager John McSweeny presented 35 and 40 year service awards at a breakfast honoring nine recipients. Pictured from left to right: (front row) Gerald R. Shirey (40 years), Alfred Montgomery (35), Laura Rose (35), Anna Barlow (35). Back row: Ron Hubbard (staff), John McSweeny, Maurice Streiff (40), Raymond Niski (35), Ed Squires (staff), William W. Sundstrom (35), Lyle Carvey, Jr. (35), Larry Hayes (staff), Walter F. Hageman (35), Dave Archibald (staff).

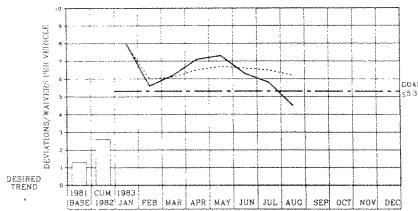
Fire Prevention Week is October 9-15. Convair's theme this year is "Learn not to burn all through the year." During the week, fire safety equipment will be on sale at the Lindbergh Field and Kearny Mesa fire stations for a discount to employees.

Quality Awareness

QIP Update: Deviations and Waivers

A deviation is written authorization to depart from a particular performance or design requirement, granted before manufacture. A waiver is written authorization for items found to depart from requirements during production but still considered to be suitable for use "as is" or reworked. The chart tracks deviations and waivers for Tomahawk all-up-rounds. The 1983 Quality Improvement Program goal is to hold the number of deviations and waivers per vehicle to 5.3 or less. As of August, the number is down to 4.5.

Deviations/Waivers — Tomahawk Missile



Professional Development

NMA Convair Chapter courses and seminars are open to all Convair employees. All classes meet from 4:30 to 6:30 p.m.

- **Effective Executive.** Begins October 12, and meets on three consecutive Wednesdays. Call Ted Parsons, LF 7865, to register.
- **Communication Skills.** Seven-week first-line supervisor course begins Tuesday, October 25. Call Nancy Kimerly, KM 3154.
- **Practical Supervision.** Begins Tuesday, October 25, and lasts six weeks. Call Steve Birmingham, LF 5581.

Security Tips

If you have access to classified material, the Security Department reminds you that need-to-know must be verified before you release classified information. Individual security clearances do not give employees automatic access to all classified material at Convair. Employees must be involved in an actual contract or project before they have authorized access to the classified material connected with that program. Contact your supervisor or department security representative if you are in doubt.

BLOOD DRIVE BEGINS TODAY

Remember Your Appointment

Place

Kearny Mesa Fire Station,
building 6, KM 1811
Lindbergh Field, building 2,
classroom 1, LF 8244
Plant 19, First Aid Station,
building 4 (trailer outside) LF 8244

Date and Time

October 3, 8:00 a.m. to 3:00 p.m.
October 4, 8:00 a.m. to 1:00 p.m.
October 5 and 6
8:00 a.m. to 1:00 p.m.
October 7, 9:00 a.m. to 4:45 p.m.

Pick up your rainbow Celebrate Life T-shirt when you donate.

Reminder: NMA Dinner Meeting

Paul Cofoni, director, DSD-Western Center, will be the host and Convair General Manager John McSweeny the spotlight speaker at the October 13 NMA dinner meeting. Featured speaker will be Dr. Michael Dean. The grand prize in the scholarship drawing is two first-class tickets to London. NMA boosters have the tickets for \$9.50 (members) and \$15 (nonmembers).

New Telephone System Is on the Way

The Dimension telephone system, which replaces our present system, is being installed at Convair. The new system is scheduled to be operational on October 31. It will be faster, easier to use, and will offer options and features currently unavailable. New touch tone telephones are already being installed alongside the old rotary dial models. The Telecommunications Department asks employees not to use the new phones until after the system has been cut over. A complete training schedule and updates about the phone system will be published in future *Weekly Logs*.

September Retirees

Convair's thanks and best wishes to these people who retired in September.

	Years of Service
Jiles C. Christian (Dept. 281-4)	
Crater Packer	32
Clifford W. Coleman (049-0)	
Aircraft Assembler	22
Jasper W. Collins (363-0)	
Engineering Standards Dev Tech	35
Francis Leroy Cook (607-0)	
Engineering Specialist	42
Robert C. Ferguson (952-0)	
Engineering Specialist	36
Wayne "Pappy" Fields (759-0)	
Metal Fitter Assembler	35
Robert E. Haltmeier (250-5)	
Construction Mechanic	33
Joe B. Harrison (131-5)	
Industrial Fire Fighter	27
Harry E. Kennon (629-0)	
Engineering Specialist	23
Lloyd F. Lewis (236-0)	
Manufacturing Dispatcher	43
James P. Morley (063-0)	
Aircraft Assembler	14
Donald J. Olson (223-1)	
Manufacturing Control Specialist	32
Cecil B. Pierce (753-0)	
Manufacturing Ops Supervisor	29
Russell E. Strayer (117-4)	
Senior Project Engineer	41

From the Health-Fitness Center

Becoming a Nonsmoker. October 5, five sessions, 5:00 to 7:45 p.m., CRA clubhouse room C.

Shape Up. Harbor Island: October 10 to November 22, 4:45 p.m. Kearny Mesa: October 10 to November 22, 4:30 p.m. Preregister at KM 3567.

Rock A'Robics. Free introductory class October 10 and 11, 4:30 p.m. in CRA auditorium.

WORKOUT. Five-week sessions begin October 12, 4:30 p.m. CRA clubhouse room A.

Drug Education. October 11, 4:45 to 6:45 p.m., CRA clubhouse room C.

Superwomen. Two-day workshop, October 13 and 18, 5:00 to 7:00 p.m., CRA clubhouse room C.

Health-Fitness center members receive discounts on all programs. For more information, contact the Health-Fitness Center, KM 3567.

Employment

For the week ending September 23, employment was 10,651.

CONVAIR Weekly Log

October 10, 1983

Published by the Convair Division of General Dynamics

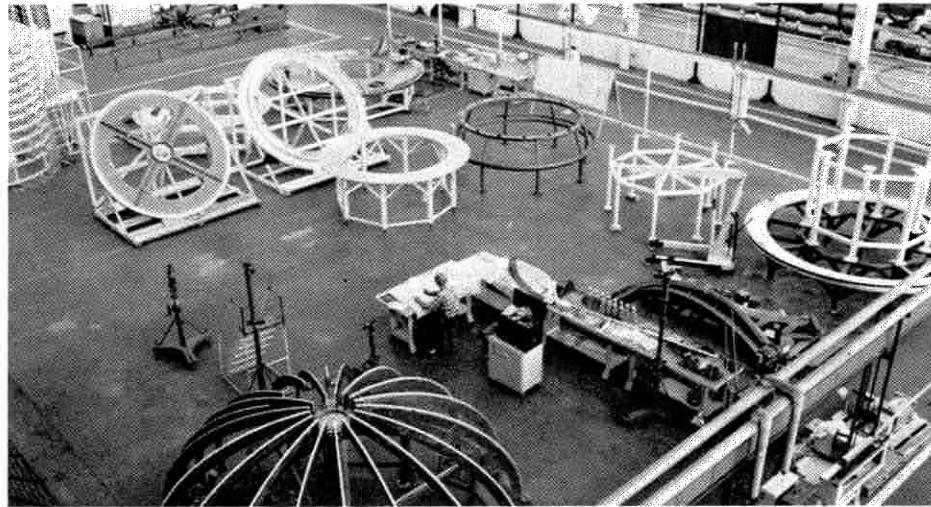
Shuttle/Centaur

Fabrication Begins Soon

The Atlas/Centaur area at Plant 19 is gearing up to begin fabrication of Shuttle/Centaur. New tools and fixtures are being installed and welding machines adjusted to accommodate the new 14-foot-diameter tank. Because the Centaur for Shuttle tank transitions from 10 feet to 14 feet, welding arms must be modified to handle the larger diameter as well as the existing one. Detail parts for fabrication are currently in work, and major items of tooling are scheduled to be in place the first part of this month. Major tools will be assembled on the floor at Plant 19.

Shuttle/Centaur preparations have been under way for over two years. The schedule for building the Centaur vehicle — designated Centaur G-prime — is critical because the scheduled launches are for planetary missions. The launches must take place in May 1986 because of the alignment of the planets (launch windows) at that time.

The first article built will be a test tank, and the two Centaur G-prime vehicles will follow.



Tools and fixtures at Plant 19 being readied for Shuttle/Centaur fabrication. In the foreground is the forward bulkhead assembly fixture.



Mirror Fusion Test Facility Update

Convair is under contract to Lawrence Livermore National Laboratory to design and manufacture twenty large superconducting magnets for the Mirror Fusion Test Facility (MFTF-B). Twelve of these superconducting magnets are solenoids, each 17 feet in diameter and weighing 15 tons. The design of the solenoids began in January 1981, and the final two solenoids, numbers 11 and 12, were delivered September 27. The engineers and technicians above were

responsible for delivering these magnets three months ahead of the customer's schedule. According to Bob Johnson, Energy Systems Marketing, the customer is pleased and the entire department is proud of their accomplishment. The crew will now move on to begin the manufacturing of the four transition magnets and the four axicell magnets, all of which are to be complete by mid-1985. Johnson says this is an ambitious schedule that will require a dedicated effort.



Pictured above are eight All-Up-Round Tomahawk cruise missiles, in their shipping containers, being readied for delivery. Many missiles are scheduled for shipment during the coming months as Convair moves further into the production phase of the Tomahawk program. Later this month, the 100th production missile of the calendar year will be delivered.

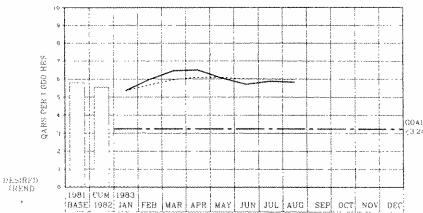
• Convair Open House • November 19 • 9:00 a.m. to 2:30 p.m. • Watch for Details •

Quality Awareness

QIP Update: MRB QARs

The volume of rejection documents (QARs) processed in the Material Review Board is a reflection of the amount of nonconforming hardware generated in the manufacturing process. MRB actions require customer approval and thus provide high visibility of the nonconformance as well as the effectiveness of the corrective action system. The QIP measurement determines the number of QARs received in MRB per 1,000 manufacturing direct labor hours. The goal is to reduce this number, thereby reducing costs involved in material control, handling, MRB labor, repair planning and labor, scrap, and corrective action. The data for the first eight months of 1983 indicates MRB QARs per 1,000 hours are 5.97, above the QIP goal of 3.24.

MRB QARs



Save Gas — Join a Vanpool

The Poway to Lindbergh Field vanpool still has some openings. The vanpool operates for first-shift employees — 7:30 a.m. to 4:15 p.m. — and parks in the flight line parking lot. Enroute, the van also stops at Mira Mesa Park & Ride. Call Doug Wenberg, LF 6518, or Ben Wheat, LF 5922, to sign up.

Professional Development

NMA Convair Chapter courses and seminars are open to all Convair employees.

- **Effective Executive.** Begins October 12, and meets on three consecutive Wednesdays at 4:30 p.m. Call Ted Parsons, LF 7865, to register.

From the Health-Fitness Center

Contact the HFC, KM 3567, for information on the exercise classes, drug education workshop, and women's workshop that begin the week of October 10.

Employment

For the week ending September 30, employment was 10,683.

Fire Prevention Week

Fire Prevention Week is an annual event designed to remind American citizens of the importance of fire safety. This year, Fire Prevention Week is October 9 through 15. Here at Convair, the message is: "Learn not to burn all through the year." During the week, fire safety equipment, smoke detectors, fire extinguishers, life ladders, and safety cans will be on sale at the Lindbergh Field and Kearny Mesa Fire Stations at a discount to employees.

Security Tips

Due to the sensitive nature of our work, entry into Convair facilities is strictly controlled. All employees, contract personnel, vendors, and visitors must be identified and badged before being allowed entry. Visitors are not authorized access to classified information without prior approval from the Security Department.

- Wear your badge on the upper left portion of your body at all times.
- Challenge anyone not wearing a badge. Escort them to their supervisor or the Security Department for status verification.
- Be sure that visitors wearing "Escort Required" badges are escorted as required.

Telephone System Update

The new Dimension telephone system will be operational on October 31. Calls coming into Convair will no longer go through the switchboards (or "attendant consoles," as they will be called after the cutover), but straight through to the desired number.

Due to station activity after the directory survey closed, the new "573" number on your touch tone telephone may not agree with the number listed in the directory. A personnel and function listing will be sent to each department for new number verification.

On October 10, postage-paid cards will be available through Telecommunications (bldg. 3, 3rd floor, col. A-6; MZ 40-2510), so you can notify business callers of your new phone number.

The new division directories will be distributed inplant and to other General Dynamics locations one week before the cutover.



Tommy Thompson (left) receiving his Outstanding Publication Award from master of ceremonies Charles Jenkins.

Tommy Thompson Honored at NMA Conference

A.R. "Tommy" Thompson, senior graphic designer in Art & Editorial, was honored last week at the National Management Association's annual conference in Milwaukee for his achievements as editor of the Convair Chapter's monthly publication, *Managair*. Tommy traveled to Milwaukee along with Convair Chapter executive officers to accept NMA's Outstanding Publication Award for chapters in size group 1, which represents the largest NMA group in the United States.

Tommy has been the reporter, editor, and graphic designer of *Managair* for nine years, and won the Outstanding Publication Award once before, in 1976. In all other years he has taken honorable mention.

Along with his responsibilities for *Managair*, Tommy, Art & Editorial's Lindbergh Field representative, has provided editorial and graphic arts support to many major Convair programs. After 27 years at Convair, he plans to retire in December. Congratulations, Tommy!

NMA Dinner Meeting Prizes

Over \$6,000 in prizes will be given away in the scholarship drawing during the October 13 NMA dinner meeting. The drawing grand prize is two first-class tickets to London and accommodations for five nights at the Hotel Intercontinental. Many other prizes will be given away that night. Tickets are on sale through NMA boosters and cost \$9.50 (members) and \$15 (nonmembers).

Weekly Log

October 17, 1983

Published by the Convair Division of General Dynamics

EXCEL**General Manager Award/Employee of the Year
Presented to Vern David**

Vern David (left) receives his General Manager EXCEL Award/ Employee of the Year award from General Manager John McSweeny (right), while Betty Jo David looks on. The award, presented at the October 13 NMA Convair Chapter dinner meeting, came as a complete surprise to Vern.

Vern David, manager of Quality Assurance for Convair's Cruise Missile Program (Dept 301), received the General Manager's EXCEL Award/Employee of the Year for 1982. In making the award presentation, Division General Manager John McSweeny said, "Since Vern joined Convair over 12 years ago, he has made significant contributions to our division. When we received the Method D rating, he immediately became instrumental in coordinating the extensive management activity." Vern's management of details concerning the Method D included:

- Development of the 80-page Corrective Action Plan
- Compilation of the corresponding presentation to government agency representatives

- Development of a 30-day status presentation to DCAS and JCMP
- Coordination of the ongoing weekly schedule reviews and updated action meetings with Convair and DCAS management
- Development of in-depth presentations to government review teams and corporate corrective action teams
- Coordination of Convair's presentations to the Method D Review Board and the corresponding narrative report that resulted in lifting the Method D

Congratulations to Vern David for this well deserved honor. His professionalism and accomplishments indicate that pride does make the difference at Convair.

GLCM on Track for IOC

GLCM equipment deliveries have been gaining momentum over the past couple of months, in support of government deployment plans. Four additional TEL and two LCC units were recently delivered, bringing the total to 16 TEL and 7 LCC units delivered. Deliveries will continue to accelerate through the end of the year with three TEL and two LCC units scheduled to go out the door this month. In addition to the actual launch hardware, 66 training and support equipment deliveries have recently been made.

A recent GLCM IOC Readiness Review, held at Convair by the JCMP, determined that everything is on track and that GLCM will achieve its initial operational capability (IOC) on schedule. Representatives from all Air Force agencies involved in GLCM deployment, including those in Europe, were here for that review.

CISS Power-On in the Systems Integration Facility

Early in the program, October 3 was established as a major Shuttle/Centaur milestone date. On that day, the Systems Integration Laboratories (SIL) was scheduled to come to life with a power turn-on. Unforeseen problems made the October 3 date seem unattainable.

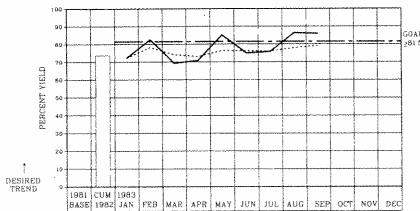
Since the planetary launch windows for Galileo and the International Solar Polar Mission are fixed (the launches must take place in May 1986), the program office challenged the avionics and software teams to hold to this critical program milestone date. Thanks to the concentrated efforts of many people, including those in Engineering, Material Control, Production Control, Procurement, Fabrication Laboratories, and Inspection, the power was turned on successfully on October 3.

On October 5, over 200 people involved with the accomplishment celebrated at the CRA pavilion. Congratulations to all for a job well done and on schedule.

Quality Awareness

QIP Update: Test Yield Acceptance
 First-time test yield is the percentage of first-time acceptable tests to the total number of first-time tests. Units that fail when presented for first-time acceptance adversely affect schedule and cost because of rework, scrap, retest, and reinspection. Therefore, the desired trend in the measurement is an upward trend. The QIP goal is to keep first-time yield at or above 81.52%. Our chart represents the first-time yield in the Tomahawk cruise missile assembly and final test area. We are currently at a cumulative average of 79.05% for the first eight months of 1983, which is above the cumulative average from 1982 and above our goal for the last two months.

Test Yield Acceptance



Fuselage Delivery

Fuselage 402 for KC-10 No. 24 was delivered to Douglas Aircraft Company in Long Beach on Monday, October 10.

W.O.W. Week Begins This Week

The fifth annual Women's Opportunity Week (W.O.W.), sponsored by the City of San Diego's Advisory Board on Women, begins today to recognize the achievements and contributions of women. W.O.W. Week offers nearly 250 events throughout the county at little or no expense to participants.

At Convair, the number of women in the workforce has increased dramatically since 1975. The number of women supervisors has grown by 530%, professionals by 876%, technicians by 816%, and crafts and operatives by 386%.

A schedule of the W.O.W. Week activities planned throughout San Diego is available at both the Kearny Mesa main lobby (building 2) and at the Lindbergh Field employment office (building 16).



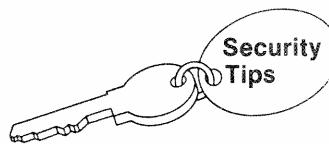
Leading the way for September Employee Suggestion awards are John Lubben and Don Shepard. The photo on the left shows Ruth Hecker, E.S. coordinator at Vandenberg; John Lubben; and Jim Copeland, Base Manager at Vandenberg. John suggested a tooling change for the Vandenberg Atlas Modification Program (VAMP) that decreased the machining time from 96 to 8 hours per part. John received \$2,105 for his suggestion. Don received \$2,135 for his suggestion to create a catalog of isometric drawings, illustrating (in color) the surfaces to be masked to simplify painting cruise missile parts. Pictured (l to r) are Ron Thomas, Operations General supervisor; Don Shepard; Gordon Lindquist, Operations General supervisor; and Bruce Marshall, Motivational Programs supervisor.

Thanks to Supervisors, E.S. Program Gains Momentum

September was a record month for Employee Suggestions. One reason for the increase in awards is the positive attention given to suggestions by supervisors. Their efforts in evaluating suggestions helped the E.S. group meet its 75 working day goal. In September, a total of \$24,378 was awarded to Convair employees for their suggestions. The following 56 employees received awards of \$100 or more.

Name	Dept	Amount (\$)
S. Anderson	250	115
G. Armstrong	019	117
R. Blair	269	309
E. Bryant	302	158
D. Cates	032	494
D. Cates	032	300
M. Conscuolo	220	102
C. Cope	432	154
R. Davis	346	475
J. Dial	038	120
J. Easton	661	882
B. Essex	031	148
D. Evanson	432	307
D. Fox	031	296
G. Funkhouser	253	356
H. Garcia	047	239
V. Gilson	015	328
P. Gordo	431	242
G. Guastafierro	067	122
F. Hadaway	281	229
W. Heincy	067	643
R. Hogue	345	145
R. Hopkins	431	117
D. Houba	067	157
S. Jones	345	272
E. Keer	050	250
G. Keer	046	170
B. Kirk	067	129
L. Lacaua	455	112
B. Lindgren	985	191
G. Long	131	487

Name	Dept	Amount (\$)
J. Lubben		985
J. Marino		283
H. McGarity		067
D. McMillan		050
E. Monroig		015
R. Notestine		036
C. Nulf		675
J. O'Connor		042
V. Perkins		134
N. Phillips		193
J. Polletta		236
C. Roach		761
W. Robinson		194
L. Sadler		352
L. Sadler		352
W. Sager		015
D. Shepard		733
H. Shidner		019
M. Smith		985
B. Stacy-George		197
L. Stephens		835
C. Stroud		759
B. Turner		253
S. Wagner		036
C. Young		661



Our Plant Protection force provides overall security for Convair's San Diego facilities. Their primary responsibility is to ensure authorization of access and egress, also: personnel access control; after-hours security checks of designated security areas and containers; collecting and securing classified information left unattended; and, deterring sabotage and theft.

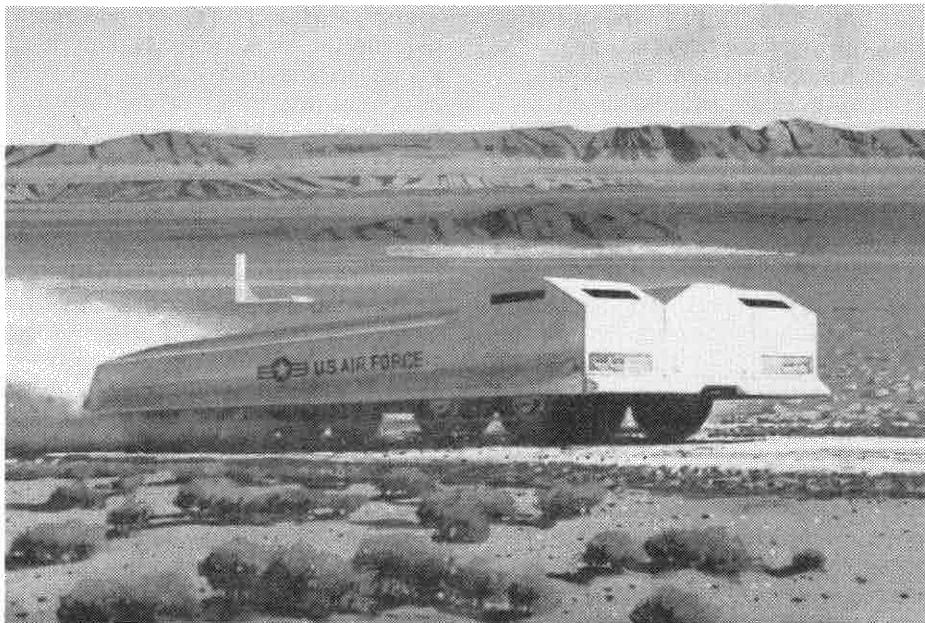
Employment

For the week ending October 7, employment was 10,737.

Weekly Log

October 24, 1983

Published by the Convair Division of General Dynamics



Hard Mobile ICBM Program. Above is an artist's concept of a hardened mobile ICBM launcher featured as part of the General Dynamics display at the recent Air Force Association show in Washington, D.C. Convair has the corporate lead for the HMICBM program. Land Systems Division has joined with Convair for the development of the crew cab and automotive components of the launcher, which is designed to operate on existing military bases. Convair also plans to compete for the small ICBM integration program. Jerry Brown is the program manager and Joe Streetman is the chief program engineer.

Convair Hosts Large Conferences

RAF. On September 28, Convair welcomed Air Vice Marshal Richard Charles Peirse and 29 students from the United Kingdom's Royal Air Force College. The students were briefed on Cruise Missile, Atlas/Centaur, and Advanced Space programs. They were hosted by Brad Beaver, Program Development.

Suppliers. The theme of the first quarterly Supplier Productivity Conference on September 30 was "Team Effort." Russ Babcock, director of Procurement, welcomed representatives of 41 key Convair suppliers. He was followed by a number of Convair speakers who presented the groundwork for our Supplier Productivity Program. The program is designed to establish a sturdy base of dedicated suppliers. The next conference will be held in December.

ASD Conference. Convair hosted the 22nd Air Force Aeronautical Systems

Division/Industry Cost Estimating Workshop on October 18 through 20. Attending the conference were Charles Adams, deputy controller of the Air Force, and 35 representatives of major aerospace corporations and ASD, Wright-Patterson AFB. Contracts & Estimating, with Bob Hartwig as host, sponsored the three-day conference.

Special Retirement Seminar for Second Shifters

For second-shift employees who are unable to attend evening sessions of the Pre-Retirement Planning Seminar, a special daytime series is planned starting Wednesday, November 16. The six-week seminar will be held from 10:30 a.m. to 12:30 p.m. in CRA clubhouse room A. Spouses are welcome to attend, and reservations can be made by calling KM 2267.

Tomahawk Scoreboard: T81:1 Successful

Tomahawk T81:1 was launched from USS *La Jolla* October 15. The missile flew a successful land attack mission to the Utah Test Range and was recovered. The flight of T81:1 completes the Navy operational evaluation phase of the submarine-launched land attack missile.

Con-Trib Tour Is Open to Interested Employees

For the last several years, the Con-Trib Club (the employee organization that oversees charitable donations to community agencies) has randomly selected employees to tour a number of United Way/CHAD agencies. These bus tours were arranged by Con-Trib to give employees a first-hand opportunity to see where their contributions go. However, a number of employees who wanted to go didn't get the opportunity because of tour limitations. This year, the organization is letting all employees know about the tour in advance so that they can call if they are interested in going. The tours are scheduled for November 3 and 4, from 8:30 a.m. to 2:30 p.m. on both days. Lunch will be included. The tours are limited to 80 people per day, so call KM 6789 early but no later than Wednesday, October 26. Thanks to you, it's working!

People Notes

Richardson Named SAWE Benefactor. John Richardson has been named a benefactor of the Society of Allied Weight Engineers for his outstanding contributions to the society. John has been a weight engineer for over 20 years at General Dynamics, where he is currently an engineering specialist in the Mass Properties group. SAWE is dedicated to promoting mass properties as a specialized discipline within professional engineering.

UK Visitors. On October 7, Convair hosted Colin Fielding and Dr. Stanley Orman for briefings on Tomahawk Cruise Missile programs. Fielding is Controller-Establishments Research and Nuclear for the United Kingdom. Orman is from the British Embassy in Washington, D.C.

FLIP

New Telephone System Is Only a Week Away

Next Monday, October 31, the new Dimension telephone system will be operational. Complete dialing instructions are printed in the new Convair Division telephone directory, which will be distributed this week. Here is a brief summary of some of the new telephone procedures.

In-Plant Calls. All 4-digit extensions will change to 5-digit numbers, as listed in the new directory. From now on, no tie line access codes are needed to call between any of the Convair plant locations or Electronics Division. You simply dial the 5-digit number.

Calls to Other Divisions. New tie line access codes to all other divisions (except Electronics) have been assigned and are listed under dialing instructions on page 2 of the new directory.

Long Distance Calls. To make a long distance call, dial 9 + 1 + area code (except 619) + 7-digit number. When you hear the recall dial tone, dial your new authorization code, and your call will be placed.

Emergency Numbers. Lindbergh Field — 25555. Kearny Mesa — 33555.

Calling In from the Outside. All telephones that are authorized to receive incoming calls from outside the plant will convert to direct-in dial. When calling in to Convair from outside,

reach Lindbergh Field extensions by dialing 69 + new 5-digit extension. Kearny Mesa extensions are reached by dialing 57 + new 5-digit extension.

The Cutover. Employees are reminded that the telephone cutover begins at 6:00 p.m. on Friday, October 28, and will continue throughout the weekend. Full telephone service will not be available during the weekend.

Videotape Training. A schedule is being distributed to supervision that gives time and place for the videotape showings on the new system.

To DSD-WC Service Center Customers: The new number of the service desk will be 33443 from in plant, 573-3443 from outside the plant.

Savings and Stock Plan Values for August

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.6163	\$ 3.1132	\$ 3.4905
Diversified Portfolio	2.0366	2.0660	3.1197
Fixed Income	1.2385	1.3786	1.5443
Hourly			
Government Bonds	2.6133	3.1113	3.4885
Diversified Portfolio	2.0803	2.1088	3.1840
GD Stock	\$22.8750	\$33.5000	\$47.7500

PLFCU Now Serves North County

Members of Point Loma Federal Credit Union who live in North County can now take care of most of their banking needs at the San Dieguito Credit Union, 1287 Encinitas Boulevard, Encinitas. Call PLFCU at 226-1600 for details.

NMACC November Meeting

Dan Da Pra, division vice president - Research & Engineering, is the host for the National Management Association's dinner meeting on November 17. Dan is featuring Ted Leitner, Channel 8 sportscaster, as the spotlight speaker. Ted will be followed by the featured guest speaker, Lee Shapiro, who is a former judge, trial attorney, and educator, and recent winner at the National Speakers Convention. His topic will be "The Pursuit of Excellence." The meeting will be held at the Sheraton Harbor Island, with a no-host cocktail hour at 5:30 p.m., dinner at 6:30 p.m., and program at 7:30 p.m. The cost is \$9.50 to members and \$15 to nonmembers. Details about the many great prizes to be offered will be announced later.

From the Health-Fitness Center

Working With People You Don't Like. October 25 and 27, 4:45-7:45 p.m., CRA Park Pavilion. The cost is \$25 for HFC/WECAN members, and \$30 for nonmembers.

Bon Appetit. Christmas cooking class, November 7 and 8, 4:45-6:00 p.m., CRA room C and kitchen. The fee is \$23 for HFC members, \$28 for nonmembers.

For more information, contact the Health-Fitness Center, KM 3567.

Professional Development

NMA Convair Chapter courses and seminars are open to all Convair employees. All classes meet from 4:30 to 6:30 p.m.

- **Communication Skills.** Seven-week first-line supervisor course begins Tuesday, October 25. Call Nancy Kimerly, KM 3154.
- **Practical Supervision.** Begins Tuesday, October 25, and lasts six weeks. Call Steve Birmingham, LF 5581.
- **Interpersonal Skills for the Manager.** Eight-week certified manager course begins Thursday, October 27. Call Bill Frank, KM 1024.

October Retirees

Convair's thanks and best wishes to these October retirees.

Name	Years of Service
Jack S. Adams (Dept. 320-0)	
Sr. Procurement QA Rep	27
Amado R. Barron, Jr. (044-0)	
Aircraft Assembler S&S	34
Betty J. Clancy (191-0)	
Accountant	30
Marvin L. French (553-3)	
Sr. Software Engineer	27
Norbert (Bob) A. Inkel (753-0)	
Group Leader	27
Edward H. Johnson (015-0)	
Manufacturing Ops Supervisor . . .	42
Edwin B. Kerfeld (043-0)	
Aircraft Assembler R&C	40
George J. Miyashiro (613-0)	
Sr. Engineer	27
Gerald W. Oliver (001-0)	
Manufacturing Ops Supervisor . . .	42
Robert J. Ratliff (019-0)	
Manufacturing Ops Supervisor . . .	36
Ralph F. Shard (658-0)	
Sr. Engineer	32
William W. Stiers (820-6)	
Technical Buyer	27
George W. Willis (131-7)	
Guard	15

Security Tip

Reproduction of classified material MUST be authorized by your document control station. The copying machines located around the plant cannot be used for this purpose. The Graphic/Reproduction department is the only source authorized to reproduce classified material.

Employment

For the week ending October 14, employment was 10,775.

CONVAIR

Weekly Log

October 31, 1983

Published by the Convair Division of General Dynamics



Ron Eckberg, program manager – Peacekeeper CDM (second from right), congratulates EXCEL award winners Brian Toy, administrator – Quality Assurance; Roy Williams, planner – Manufacturing; and Rodney Stith, manufacturing engineer.

Peacekeeper Composite Deployment Module Fabrication Moves to Lindbergh Field

Outstanding effort from some key Convair employees (photo above) helped the recent transition of the Peacekeeper (formerly MX) Composite Deployment Module fabrication from the engineering shop at Kearny Mesa to the production shop at Lindbergh Field. Nine of the 20 deployment modules being built for AVCO under the existing contract were made in the Material and Processes department at KM and the final 11 units will be fabricated by the Production Plastic shop at LF.

The module is a wafer-shaped structure 8 feet in diameter, 15 inches deep that weighs 268 pounds. The detail parts of the structure are fabricated from an aluminum and graphite/epoxy composite. All the interfacing joints between parts are both adhesively bonded and mechanically fastened with aluminum rivets or titanium bolts. The Peacekeeper system is a multi-payload, four-stage ICBM. The payload — reentry vehicles (RVs) — is supported by the deployment module just forward of the fourth stage. The deployment module has built-in flexibility with regard to the type and number of RVs it can support. An insulated titanium shroud is attached to the forward outer periphery of the deployment module. It protects the RVs during launch and is jettisoned as soon as the vehicle passes out of

the dense atmosphere near the earth's surface.

The 20th unit is being assembled now and is scheduled for delivery on December 22. Contractual authorization from AVCO to build ten additional program development articles is expected soon. These units will be delivered in 1984 and 1985. A request for proposal to build 21 production units is expected before the end of the year.

EXCEL

Nominations Open for 1983 General Manager's Award

EXCEL is about people. It's about Convair employees. It's about recognition for outstanding achievements above and beyond normal job requirements.

Each year the EXCEL committee helps to select the General Manager's award for Employee of the Year. Any supervisor may nominate an employee for this award — the highest in the division. Nomination considerations are exhibiting extraordinary leadership capabilities, displaying noteworthy innovation or creativity, reducing costs significantly, or making outstanding quality improvements. Recipients of EXCEL citation awards are automatically considered for the General Manager's award.

Nominations for the 1983 award must be in by December 9. If you have any questions, call Evelyn Cain at KM 39943.

Open House Rescheduled

Because of the current public focus on important national issues that involve a number of our products and the concern for ensuring timely delivery in support of our nation's needs, the Convair open house previously scheduled for November 19 has been rescheduled for spring of 1984.



(L-R) Russ Babcock and Chuck Patmon accept San Diego City Council award from John Leppert, Small Business Advisory Board, and Councilman Ed Struiksma.

City of San Diego Honors Small Business Program

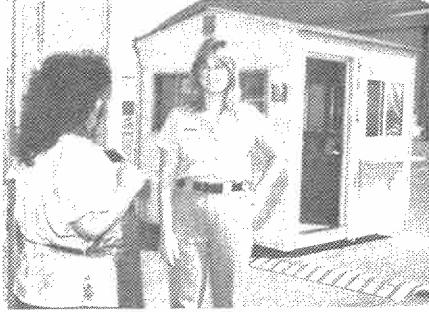
Russ Babcock, director of Procurement, and Chuck Patmon, Small Business administrator, were at the October 17 meeting of the San Diego City Council to accept a special resolution from the council commending General Dynamics Convair Division for its Opportunities in San Diego program. The resolution was presented by Councilman Ed Struiksma who called the program "a progressive model for sound economic development," and was signed by all council members and Mayor Roger Hedgecock.

Opportunities in San Diego is designed to increase the number of small business suppliers to Convair. It aims to qualify 100 new, local small businesses, especially minority- and women-owned businesses. The program is not only a community involvement activity but also an ongoing effort to keep Convair ready for new business opportunities as new contracts are awarded.

In November, the program will conduct onsite surveys of 175 firms to qualify the final 100. The most important qualification will be whether firms can meet Convair's quality standards.

Congratulations to Chuck Patmon and the Small Business Department.

New Maintenance Dispatch Numbers: LF 28575 • Plant 19 25675 • KM 38269.
(Note: P-lines will still be used on the appropriate NC machines.) **Attention: In-Plant Page Users:** Today change from 113 + unit to 34113 + unit number.
Help or Phone Problems: KM 33413. **Information KM 33417.**



(Top row, l to r) John Medina at KM; Jim Gilley, KM; and Diane Hefner at Harbor Drive. (Bottom row) Nick Inganna at Plant 19; Rowan Sokolowski, Plant 19; and Ron Kerzner, LF.

Plant Protection Force Carries Important Responsibilities

The 87 men and women of the Plant Protection department are responsible for providing the overall physical security for all Convair facilities in the San Diego area. They all have past security work experience, go through specialized firearms and power-to-arrest training, and are licensed by the State of California.

Primarily, they are responsible for checking that only authorized people and vehicles go in and out of the plant, for protecting classified information, and for deterring sabotage and theft of government, corporate, and personal property. To do this, they are on duty at 12 plant gates during daytime hours and at selected gates on a 24-hour basis. Checking the entrances where there is heavy vehicle traffic as well as pedestrian traffic, such as Gate 11 at Lindbergh Field, Gate 23 at Plant 19, and Gate 1 at Kearny Mesa, requires two guards working together during peak hours to handle both ingoing and outgoing traffic.

When not on duty at plant gates, guards also conduct after-hours checks of designated security areas throughout all plant locations to make sure that security containers are locked and that no classified material has been left out or unattended. If material is left out, they must collect

it, lock it up, and issue security violations to the offenders.

The *Weekly Log* asked Clarence Miller, Plant Protection supervisor, what is the most helpful thing employees can do to cooperate with our guards. His reply, "Wear badges correctly." The reason for this is that the guards must look at hundreds of people arriving for work at the beginning of a shift — almost 1,300 people at Kearny Mesa's building 2 lobby, for example. If the badge is being worn correctly on the upper left portion of the body, the guards can see it immediately, even at a distance. Employees can also cooperate by having briefcases, handbags, and lunch containers ready to be checked when arriving and leaving work.

Finally, Plant Protection reminds all employees that many of the new contracts being awarded to Convair are government-classified and require strictly enforced security practices. Cooperating with the guards as they perform their duties and developing good personal security habits is the responsibility of each employee.

The purpose of the Weekly Log is to inform employees about Convair products and the accomplishments of people. You can help by contacting the Weekly Log coordinator if you have ideas for stories. Call Julie Andrews at KM 39955 or send written material to MZ 33-1334.

Professional Development

NMA Convair Chapter courses and seminars are open to all Convair employees. All classes meet from 4:30 to 6:30 p.m.

Change in Interpersonal Skills for the Manager. Postponed start to November 10, and class will be held for 10 Thursdays instead of 8. Bill Frank, KM 38206.

Introduction to Supervision. Starts November 3 and runs for 7 Thursdays. Krista Edmunds, facilitator, KM 35357.

Management Principles. Starts November 9 and runs for 7 Wednesdays. Mike Lutich, facilitator, KM 34151.

Call the course facilitator to sign up or Julie Kent, LF 25885.

From the Health-Fitness Center

Bon Appetit. November 7 and 8, 4:45 to 6:00 p.m., HFC members, \$23; nonmembers, \$28. CRA clubhouse room C and kitchen.

Yoga. Tuesdays, 4:30 p.m. Missile Park. HFC members, \$30, nonmembers, \$35 for five weeks of instruction.

For more information, contact the Health-Fitness Center, KM 39921.

Employment

Employment for the week ending October 21 was 10,799.

CONVAIR

Weekly Log

November 7, 1983

Published by the Convair Division of General Dynamics

Move to New Kearny Mesa Building 25. Rick Mortimer (left), an engineer on the Shuttle/Centaur program, and Bob Di Nal, director — Avionics, are getting used to their new home. As part of the continuing colocation effort at Convair, over 500 people moved into the new engineering building at Kearny Mesa the weekend of October 28. The move — largest in Convair's history — consolidates people in the Research & Engineering organization (Department 600). Building 25 is undergoing some final interior construction. The *Weekly Log* will spotlight some of the building's features in future issues.

Value Engineering Concludes

Forty-one Convair employees, representing Engineering, Quality Assurance, Estimating, Purchasing, and Operations, received certificates for successfully completing the two-week Value Engineering workshop that concluded on October 28. At the workshop's kickoff on October 17, General Manager John McSweeney spoke about the importance of what they were doing, both for the division and for the government. His remarks were echoed at the graduation by Dan Da Pra, division vice president of Research & Engineering.

Value Engineering is a technique for evaluating an item's function to remove unnecessary cost. At the concluding presentations, an estimated potential saving of \$41 million was

presented to management by the eight teams that comprised the class. "My goal was \$5 million," said Capt. Mike Iverson, USN, the JCMP on-site representative, referring to his challenge at the workshop's beginning. "I am pleased that you were able to meet the goal eight times over."

Capt. John McKechnie, USN, the DCASPRO commander, emphasized to the graduating class that his staff was available any time for Value Engineering instruction. "I am your advocate," he said. "V.E. is an important element in the industrial/military partnership."

Employees who are interested in finding out how to submit a Value Engineering Change Proposal should call Bill Frank at KM 38206.

Call forwarding must be reprogrammed this morning at KM, Seville, and Sycamore because of the weekend power outage.

SHOW YOU CARE — PLEASE SHARE**Con-Trib Campaign Begins November 8**

This year the employees' Con-Trib Club membership campaign will run from Tuesday, November 8, through Wednesday, November 23. Organized in 1952, the Con-Trib Club is the employee organization that solicits charitable funds through payroll deduction. The club is governed by an employee board of directors. Ninety percent of all Con-Trib funds go to selected charitable agencies, with a substantial amount pledged annually to United Way/CHAD. Agencies not funded by United Way or CHAD are funded at the discretion of the Con-Trib board of directors, which evaluates agencies by making personal visits and by examining records. The remaining ten percent of the funds is used to assist employees through the Emergency Aid Program.

This year's goal has been set at \$1 million to meet the steadily increasing needs of the community. The club needs the membership of every employee for a successful campaign. Show you care — please share. Sign your pledge card and become a member of your Con-Trib Club.

Attention**PLFCU Direct Depositors**

All branches of the Point Loma Federal Credit Union will be closed on Friday, November 11, for Veteran's Day, which is also a Convair payday. For those employees who use direct deposit into the credit union, funds from direct deposit will be available on Thursday, November 10, at PLFCU, or through any 7/24 machine.

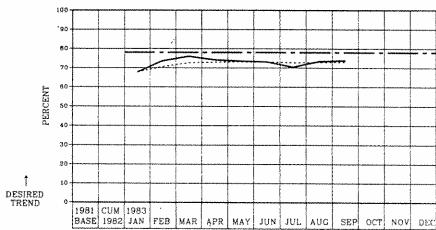
EXCEL**Reminder: Nominations Open For 1983 General Manager's Award**

Nominations for the 1983 General Manager's Award must be in by December 9. If you have any questions, call Evelyn Cain at KM 39943.

QIP Update: On-Time Deliveries of Production Requirements

This element measures the efficiency and timeliness of getting the required purchased materials from our vendor sources into the manufacturing process in our factory areas. Our Quality Improvement Program measurement is the number of material items received on time at the dock as a percentage of the number of manufacturing demands scheduled for delivery each month. The lower the percentage, the more costs are driven upward and schedule requirements not met. The QIP goal is to keep the percentage of on-time deliveries at or above 77.98. The most recent data shows the percentage for September to be 73.87, more than 3% below our goal. The cumulative average trend for the first nine months of 1983 is favorable, but continues to be below our goal.

Percent of On-Time Deliveries



Pre-Retirement Planning Seminar for Second Shifters Still Open

A special daytime series on pre-retirement planning will start on November 16, and continue for six consecutive Wednesdays, from 10:30 a.m. to 12:30 p.m., at the CRA clubhouse, room A. Spouses are welcome to attend. Make reservations by calling KM 39911.

Security Tip

Department of Defense-cleared employees who generate classified material are reminded that they are responsible for the protection of that material. Classified notes, working papers, and drafts must be marked with the appropriate classification marking — Secret, Confidential — at the time they are being composed. This classification must be stamped or printed in large letters, not typed. Check your classified holding to ensure all material is properly marked.



1983 Blood Drive, The Best Ever

Helen Grant, R.N., supervisor - Central Medical, received a special award from the San Diego Blood Bank on November 1 for her support in organizing the blood drives at Convair over the last five years. In making the award, Debbie Syverson of the San Diego Blood Bank pointed out that the award is a new program to recognize those people in the community who have provided the blood bank with outstanding support.

For the record, the total of this year's two blood drives topped last year's by 127 units, with 1,377 total units of blood drawn. As she accepted the award, Helen was quick to thank the entire support group who worked so hard on the blood drives. She included the firefighters who took the reservations, all the Convair and Western Center employees who gave of themselves, and a special thank you to Vern Gilson of Department 015, who personally recruited 40 people to donate blood.

Some "Celebrate Life" T-shirts remain from the recent blood drive. Anyone who contributes blood at the blood bank may bring their receipt to the closest Central Medical and receive a shirt while they last.

Employment

Employment for the week ending October 28 was 10,861.

Professional Development

NMA Convair Chapter courses and seminars are open to all Convair employees. All classes meet from 4:30 to 6:30 p.m.

Change in Interpersonal Skills for the Manager. Postponed start to November 15, and class will be held for 10 Tuesdays instead of 8. Bill Frank, KM 38206.

Management Principles. Starts November 9 and runs for 7 Wednesdays. Mike Lutich, facilitator, KM 34151.

Call the course facilitator to sign up or Julie Kent, LF 25885.

Computer Courses. Texas Instruments will present five separate courses at Convair if enough people sign up. The courses are:

Computer Awareness	\$39.95
BASIC Programming	39.95
TI Extended BASIC	39.95
Microsoft Multiplan	75.00
TI Writer	39.95

If you are interested, make your reservation by sending your check, payable to Texas Instruments, to Vivienne Pollard, MZ 50-1311. Time and place will be announced later. For more information, call KM 39911.

From the Health-Fitness Center

- **Bon Appetit.** November 7 and 8, 4:45 to 6:00 p.m., CRA clubhouse room C and kitchen. HFC members pay \$23, nonmembers \$28.
- **WORKOUT.** November 16 to December 16, 4:30 to 5:30 p.m., CRA room A. \$18 for HFC members, \$22 for nonmembers.
- **Rock A'Robics.** November 16, CRA auditorium. \$25 for nonmembers and \$20 for HFC members. Mondays and Wednesdays, 4:30 p.m. Tuesdays and Thursdays, 4:30 and 5:30 p.m. For more information, contact the Health-Fitness Center KM 39921.

San Diego Community Colleges Sign Up for Spring Semester Classes

Enroll and register before the start of the Spring 1984 semester at:
Lindbergh Field Plant — building 14, classroom 14-7
Tuesday, November 15, from 2:00 to 5:00 p.m.
Kearny Mesa Plant — building 2 lobby
Wednesday, November 16, from 2:00 to 5:00 p.m.

CONVAIR Weekly Log

November 14, 1983

Published by the Convair Division of General Dynamics

Tomahawk Scoreboard:**T84:1 Successful**

Tomahawk land attack nuclear missile T84:1 was successfully launched on October 27 from a land-based ship vertical launcher system (VLS) module at the Pacific Missile Test Center. Compatibility between the production ship VLS module and a Tomahawk production air vehicle, which was the major objective of this flight, was successfully demonstrated by this launch. Engineering flight control data was acquired during the one hour and forty-five minute flight. Although primarily over water, T84:1 crisscrossed San Clemente Island a number of times to obtain navigational updates from the terrain contour matching (TERCOM) guidance system.

IRAD Brochure**Exceeds Goal Score**

Convair's 1983 Independent Research & Development (IRAD) brochure score has exceeded the projected goal. This announcement comes from Dr. Merle Aleshire, director - Program Development IRAD, B&P, CRAD, who said that Convair's score of 8.12 out of a possible 10.00 again exceeds the national average. Seven out of the 34 brochure projects received a score of 9.0 or more.

Each year, Convair submits a brochure summarizing the year's technical progress and describes our research plans for the coming year. This brochure is evaluated by technical personnel representing the military services and NASA. The evaluation is then used to establish the allowable government ceiling for the company's IRAD expenditures.

The entire technical team that worked hard on this project is to be congratulated on a job well done. Individuals who contributed to the project will be receiving a special division award.



Fifty-two people from the Atlas/Centaur final assembly area were recently presented EXCEL awards in recognition of their special efforts that resulted in the fast and efficient replacement of the propellant ducts for Atlas 6003H. The task was completed in half the scheduled time, which allowed the vehicle to be available for its critical mission earlier than anticipated. Before the award ceremony, a meeting was held in the final assembly docks for all Department 761 people. At both meetings, Air Force and Convair Division management told how employee integrity in reporting problems and dedicated efforts in responding to schedule and workmanship challenges contributed to the Space Program's success. An Air Force official emphasized that our ability to continue to meet difficult challenges with a high degree of professionalism is why they keep coming back to Convair.



Con-Trib board members share conversation with Johnny Rodgers at the kickoff breakfast (l to r): Ray Mendoza, manager - Employee Benefits and Security; John Glover, UAPP Con-Trib board representative; Roy Johnson, IBEW representative (also this year's loaned executive to United Way); Johnny Rodgers; and Bill Hickey, IAM representative.

**SHOW YOU CARE —
PLEASE SHARE**
Con-Trib Club Campaign Begins

Con-Trib's 1983 campaign began officially with a kickoff breakfast held at the Kearny Mesa plant on November 8. Department coor-

dinators gathered with division staff and members of the Con-Trib board to hear Johnny Rodgers, Heismann Trophy winner and former San Diego Charger football star, speak about the needs of our community. Page Jones, United Way campaign chairman for 1983, spoke on behalf of the United Way and thanked Convair Division for its consistent and strong support.

For new employees, the Con-Trib Club board of directors is the employee group that administers charitable donations solicited through payroll deduction. A substantial amount is pledged annually to United Way/CHAD, and the remainder is given to other agencies at the discretion of the board. Ten percent of all funds raised is used to support the employee emergency aid fund.

Increasing needs throughout the community have brought about this year's goal of \$1 million. Addressing this goal and reflecting upon "our responsibility to our fellow man," General Manager John McSweeney expressed the hope that the Con-Trib campaign would enjoy the same support from Convair people as the recent U.S. savings bond drive.

To everyone from the Con-Trib board: SHOW YOU CARE — PLEASE SHARE.

Mark your calendar. Dust off your dancing shoes. Tickets go on sale Wednesday, November 16, for the NMACC Christmas dinner dance sponsored by Industrial Relations at the Hotel Del Coronado on Saturday, December 10. See your NMACC booster. Flyers with more details will be out soon.

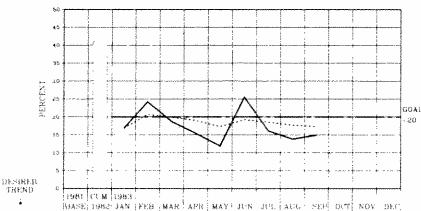
Making a Difference

QIP Update:

Avoidable Drawing Changes

In an effort to measure and improve the quality of product design, the number of avoidable engineering change requests is being tracked. Avoidable changes are those changes due to some inadequacy or fault in the engineering release package; that is, changes required to make the product work or make it producible on the manufacturing floor. The QIP measurement is the ratio of avoidable "drawing changes" to total monthly drawing releases. The latest data shows the percentage of avoidable changes to be 14.9. The year-to-date cumulative average of 17.3 percent, represented by the dotted line, continues a favorable downward trend below the goal of 20 percent or less.

Avoidable Drawing Changes



Security Tip

Are you aware of the actions that can bring about security violations?

- Leaving classified or General Dynamics Private Information material unattended.
- Leaving a security container unlocked.
- Releasing classified information without establishing need-to-know.
- Transmitting classified information over the telephone or other electronic equipment.
- Reproducing classified material on copying machines.
- Processing classified material on word processors or computers without prior Department of Defense approval.

All of these infractions can result in compromise of classified information. When security violations are issued for these infractions, the individual's supervisor is notified, the infraction is fully investigated, and a report made to the Defense Investigative Service. Here at Convair Division, disciplinary action for security violations ranges from a verbal reprimand to termination of security clearance or loss of employment for serious or multiple violations.

Be aware. Security is serious business.

Savings and Stock Plan Values for September

	1981	1982	1983
Salaried			
Government Bonds	\$ 2.6551	\$ 3.1786	\$ 3.5559
Diversified Portfolio	1.9331	2.1060	3.1968
Fixed Income	1.2494	1.3912	1.5588
Hourly			
Government Bonds	2.6522	3.1762	3.5541
Diversified Portfolio	1.9745	2.1497	3.2625
GD Stock	\$22.2500	\$32.5000	\$53.6250

The Employee Benefits office at Lindbergh Field building 16 will be open on a full-time basis starting today. Office hours will be from 7:00 to 11:30 a.m. and 12:15 to 3:45 p.m., Monday through Friday.



EXCEL — Pride Makes the Difference. The increase in rate production and deliveries since May has placed a big responsibility on the people supporting the DD-250 sell-off of cruise missiles. Dave Archibald, director — Quality Assurance, recently presented a group EXCEL award to these people for their "total dedication" in support of this effort. Pictured above are (front, left to right): Lyn Hummel, representative — Operations; Steve Teggart, supervisor — Quality Assurance; Barbara Cranmer, specialist — Quality Assurance; Tommy Smith, supervisor — Quality Assurance; Joe Rogers, superintendent — Operations. (Back row, l to r): Dave Archibald; Jerry Garrett, senior specialist — Quality Assurance; Dick Powell, supervisor — Quality Assurance; and Floyd Hangen, DCAS Quality Assurance.

Does Convair Have Your Correct Home Address?

Important employee benefits information will soon be mailed to your home, so now is a good time to make sure your address is correct. Take a look at your last paycheck; the address there is the one that appears in all company records. If it's not correct, or if no address appears on your check, fill out and submit a pink change-of-address card, available at time clocks and in the KM and LF Employee Benefits office. Incorrect addresses can cause delays or additional postage charges and might cause you to miss receiving important information about your benefits.

San Diego Blood Bank Continues Appeal

More than 270 units of blood and blood products used by San Diego's first liver transplant patient have made it necessary for the San Diego Blood Bank to appeal for donations from the community. According to the blood bank people, the supply is holding just above the safety level at this time. However, a second liver transplant has been performed and a third is imminent. The blood bank, located at 440 Upas, is open from 8:30 a.m. to 7:00 p.m. on weekdays and 8:00 a.m. to 6:00 p.m. on Saturdays and Sundays. If you go to make a special donation, please be sure to tell the blood bank you are from Convair and the donation will be credited to the Convair Reserve Fund even though it will be used for the community crisis at this time.

From the Health-Fitness Center

- **WORKOUT.** November 16 to December 16, 4:30 to 5:30 p.m., CRA room A. \$18 for HFC members, \$22 for nonmembers.
- **Rock A'Robics.** November 16, CRA auditorium. \$25 for nonmembers and \$20 for HFC members. Mondays and Wednesdays, 4:30 p.m. Tuesdays and Thursdays, 4:30 and 5:30 p.m. For more information, contact the Health-Fitness Center KM 39921.

Employment

For the week ending November 4, employment was 10,897.

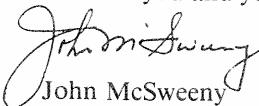
CONVAIR

Weekly Log

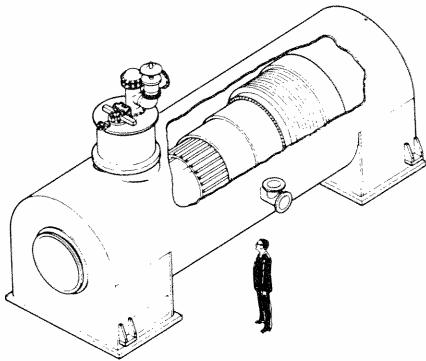
November 21, 1983

Published by the Convair Division of General Dynamics

This Thursday, we will join with the entire nation in celebrating the Thanksgiving Day holiday. In addition to giving thanks for the many blessings in our lives, it is an appropriate time to say thank you to our fellow employees — something we often forget in our busy workplace. Let me take this opportunity to thank each and every one of you for your contributions to Convair. I also want to extend my best wishes to you and your family for a safe and enjoyable holiday.



John McSweeny
General Manager



Energy Systems' New Business

TRW has selected Convair to design and manufacture a 210-ton superconducting magnet to be used for uranium enrichment. The Production Magnet System (PMS II) is a spinoff to the Prototype Magnet System (PMS I), which we designed, manufactured, and delivered to TRW in May 1981. PMS I has been operating successfully since September 1981. PMS I and PMS II are both superconducting solenoids. The major differences between the two are magnetic field and weight. PMS II will be 6 tesla and 210 tons, and PMS I is 2 tesla and 44 tons. (Tesla is a unit of magnetic field measurement.) The illustration above shows the size of the PMS II in comparison to a person.

Contract negotiations are now in progress, and contract go-ahead is scheduled for January 1984. PMS II will be delivered to the Department of Energy's Savannah River Plant in South Carolina in February 1987. Congratulations to Greg Danninger, program manager, and Dave Walker, chief engineer, and the entire team for their winning proposal.

Tomahawk Scoreboard: T102:2 Successful

Tomahawk land-attack nuclear missile T102:2 was successfully launched from USS *Merrill* on November 14. T102:2 flew a typical land-attack mission from the launch point near San Nicholas Island off the coast of California to the Utah Test and Training Range where it performed a zoom and burst maneuver during target overflight. The missile was recovered after a 2 hour and 1 minute flight during which all flight objectives were accomplished. T102:2 was a development test flight and the first of four armored box launcher flights leading to the completion of operational evaluation in February 1984. The next flight from USS *Merrill* is a development test/operational test in mid-December with missile T103:1.

Notice to U.S. Savings Bond Purchasers

Since November 1, the issuance of U.S. savings bonds has been delayed pending the passage of legislation by the U.S. Senate to raise the government debt ceiling. The legislation has now been passed, and bonds will be issued in the next few weeks reflecting the issue date on which you completed buying the bond. There will be no loss of revenue or interest on any bond you have purchased or are now purchasing.

Weekly Log Schedule

Because of the short Thanksgiving holiday week, there will be no *Weekly Log* on Monday, November 28. The next *Weekly Log* will be published on Monday, December 5.



Shuttle/Centaur Program Review

Andy Stofan, NASA/Lewis Research Center director, and Larry Ross, NASA/Lewis Research Center space flight systems director, visited Convair Division on October 25 and 26 to review the Shuttle/Centaur program. During a factory tour, they made a stop at the Avionics Development Laboratory. Clockwise from left: Hiroko Whitney, electronics technician in Department 626; Harry Eastman, Shuttle/Centaur program office; Andy Stofan; Rich Jumont, NASA/San Diego resident office chief; Larry Ross; and Russ Thomas, Shuttle/Centaur program office. They are observing the electrical distribution unit, which is the central power distribution point for the Shuttle/Centaur avionics. During the tour, they also visited the Shuttle/Centaur Systems Integration Lab, the building 5 assembly docks and full-scale mockup, and the Plant 19 Shuttle/Centaur test tank buildup.

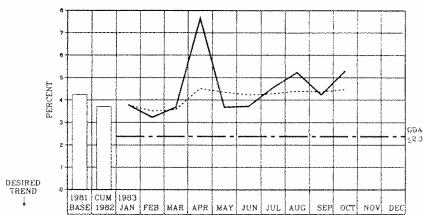
The GLCM team of Army, Navy, Air Force, and contractor personnel has delivered the necessary equipment and systems to achieve initial operational capability on schedule in England. I wish to personally thank the men and women of General Dynamics whose dedication and hard work made this possible.



Donald J. Couture
Colonel, U.S. Air Force
GLCM Program Manager

QIP Update: Rework/Repair

Rework/repair is the labor required to correct a nonconformance identified on an inspection rejection document. The controlling documents for rework/repair accounting are the Quality Assurance Report (QAR) and the Quality Completion Order (QCO). The measurement is the actual hours spent on rework/repair as a percentage of the total actual manufacturing direct labor hours expended monthly. The 1983 goal is to keep the hours spent on rework/repair to under 2.38% of the total hours. The accumulated year-to-date average for the first ten months of 1983 shows an adverse trend.

Rework and Repair**November Retirees**

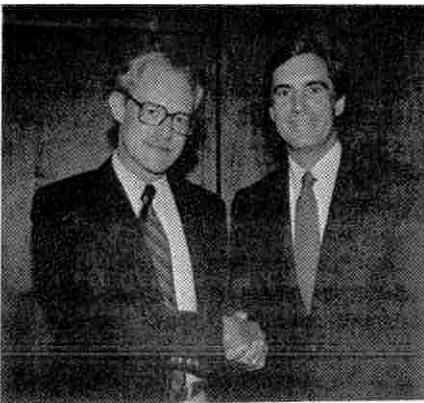
Convair's thanks and best wishes to these employees who are retiring in November.

Years of Service

Merced E. Arteaga (Dept. 042-0)	20
Aircraft Assembler S&S	25
Janice D. Calabrese (543-1)	
Machine Operator A	13
James E. Cassidy (046-0)	
Ops Supervisor - Manufacturing . . .	43
James W. Hart (001-0)	
Group Leader	24
Donald E. Hawk (979-3)	
Material Processor	25
Edward C. Jankowski (019-0)	
Cable Assembler	37
Helen M. Kuentzel (268-0)	
Logistics Support Parts Analyst . . .	31
John R. Leadaman (454-0)	
Group Leader, Tool & Die	42
Allen G. Marler (046-0)	
Surfaces & Structures Assembler . .	17
Vernil H. Martin (250-5)	
Crane Rigger	40
Jack R. McDonald, Jr. (759-0)	
Resistance Welder	38
Charles E. Wilson (951-0)	
Program Director - STS/Centaur . .	29

SSIP Value Update

The correct value for September's hourly diversified portfolio is \$3.2628.

People Notes

Robert E. Arndal, new mayoral appointee to the Board of Library Commissioners, receives congratulations from San Diego Mayor Roger Hedgecock. Robert, Convair's reference librarian, is beginning a two-year term as the policy advisory for the city's library system.

Bob Johnston, manager — Engineering Cost Analysis (Department 111), has received the 1983 President's Award from the Society of Allied Weight Engineers for his service to the society. Bob has served the SAWE in several international capacities, most recently as chairman of the Technical Advisory Committee.

Security Tip

A story in the news last week told about the investigation into the discovery of F-14 aircraft classified material found in a trash bin in Poway. The material had apparently been in the possession of a student pilot. This news story underscores the importance of this week's security tip: classified material cannot be hand-carried out of the plant without authorization from the Industrial Security department. Process all incoming and outgoing classified information through a document control station. No one is authorized to take classified material home for any reason whatsoever.

Annual Christmas Dinner Dance at the Hotel 'Del'

Saturday, December 10, is the date for the NMA Convair Chapter Christmas Dinner Dance at the Hotel Del Coronado. Table reservations are being handled a little differently this year. You must have your ticket numbers before calling Vivienne Pollard at KM 39911 to reserve table

seating. After phoning in your reservation, you must then tear off the lower portion of your ticket and send it to her at MZ 50-1331 to confirm the reservation. Tickets for this event go fast, and this year is no exception. See your NMACC booster — and see you at the 'Del.'

Employee Suggestions Program Reports Backlog Reduction

With the help of many supervisors, Employee Suggestions analysts are moving closer to their year-end goal of reducing the pre-June 1983 suggestion backlog to zero. Supervisors like Del Dimmitt (Department 130), Jim McIntyre (050), and Frank Signorelli and George Williams (120) are working closely with E.S. analysts not only to zero out the old backlog but to turn around new suggestions in less than 75 working days. The approach must be working because backlogged suggestions are down from 2,400 in June to less than 600 as of the end of October.

In October, 56 employees shared awards of up to \$100, and 20 employees took home awards of \$100 or more. They are:

Name	Amount
Scott Blanck (Dept. 280)	\$209
E.L. Bryson (759)	166
Charles Collins (250)	311
Don Digenan (050)	259
Gilbert Franco (050)	128
Robert Gross (067)	398
R.S. Hopgood (352)	112
Jerry Hydle (835)	231
Donald Koster (031)	100
Lynn Matzenauer (050)	150
Harold McDaniel (439)	165
H.T. McGarity (067)	132
O.H. Miller, Jr. (001)	375
W. Doug Prager (063)	104
Ronald Reekers (350)	106
Emil Slovacek (067)	178
Mark Smith (050)	381
W.A. Snyder (352)	112
Evon Wilson (067)	248
C.A. Young (661)	185

From the Health-Fitness Center

The Health-Fitness Center awards banquet for all past Shape-Up participants will be on Tuesday, November 22, at 5:00 p.m. in the CRA Missile Park pavilion. The cost is \$8.50. Call HFC for more information at KM 39921.

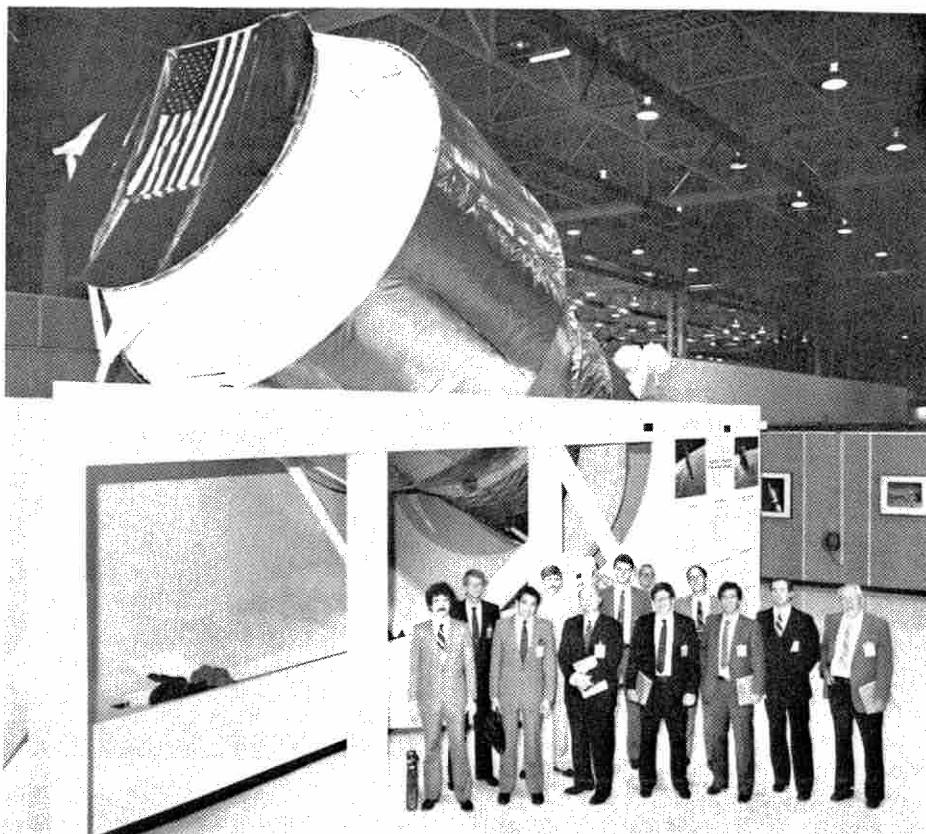
Employment

For the week ending November 11, employment was 10,930.

CONVAIR Weekly Log

December 5, 1983

Published by the Convair Division of General Dynamics



One of the groups attending the Shuttle/Centaur Vendor Conference. Full-scale mockup of the Centaur G-Prime vehicle is shown rotating up from the Shuttle cargo bay mockup.

Shuttle/Centaur Vendors Here for Program Review

Over 65 subcontractor representatives attended the Shuttle/Centaur Vendors Conference here on November 18. They represented 48 major companies that are providing material and components to support the Shuttle/Centaur development and production program.

Hosted by Art Regopoulos, manager - Procurement, the conference began with an overview of the program by Bill Rector, division vice president - Space Programs, and Marty Winkler, Shuttle/Centaur program director. Red Robbins, NASA/LeRC Shuttle/Centaur program manager, spoke and Bill O'Neill, NASA/JPL Galileo program manager, presented a summary of the two missions for Shuttle/Centaur: the Galileo mission to study the planet Jupiter and the International Solar Polar Mission to study the polar areas of the sun.

Conference presentations emphasized schedule and high quality because the two missions must be launched within a 21-day launch window in May and June.

The conference ended with a tour of the Shuttle/Centaur full-scale mockup in the final assembly area in KM building 5.

Rider/Driver Lot Available at LF

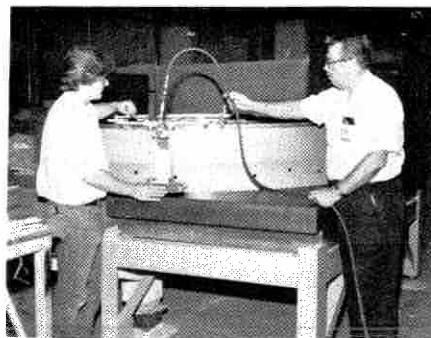
The company is continually working to improve the parking facilities at the Lindbergh Field plant. As part of this ongoing effort, a rider/driver lot has been set aside in Lot 4, located directly across from Gate 2 along Pacific Highway, south of the overpass. To park in the lot, a vehicle must have three or more Convair-employed occupants (a driver and two or more passengers). Employees are urged to take advantage of these additional reserved parking spaces. A Convair guard is on duty to help direct employees and monitor the lot.

No Problem Too Difficult for Convair Problem-Solvers

During final inspection of the 17th Peacekeeper composite deployment module, a dimensionally unacceptable condition was found in one of the surfaces precision-machined into the module's outer shell. Because of high replacement costs, it was decided that the part be repaired.

Charlie Maikish, supervisor - Materials and Processes engineering development shop, was enlisted to develop and direct the repair procedure. In just one week and with the help of Nick Dyson, a machining apprentice, Charlie designed, fabricated, and proofed a portable milling tool that can precisely remove material in 1- to 2-mil thick increments from the 8-foot-diameter, 3/4-inch wide aluminum ledge.

Thanks to Charlie's ingenuity, the repair was successfully accomplished in three days. Customer representatives from AVCO Systems found the hardware acceptable, and deployment module No. 17 was shipped on November 29.



Pictured with the portable milling machine he designed and built is Charlie Maikish (right) and Nick Dyson.

Convair Community Service Wins Recognition

Jack Coffman and Gene Butler of Lindbergh Field Operations were on hand at a recent meeting of the San Diego City Council to accept a resolution honoring Convair for helping the city library avoid a major loss. About a year ago, a weekend leak in the water system flooded the floor where back issues of the San Diego Union

and Tribune are kept. As a result, the newspapers became water soaked.

The library called the preservation department at the UCSD library, which in turn got in touch with Convair. Gene Butler and Mike Perry, in the Plastics and Metalbond area at Lindbergh Field, went to work on the problem with the concurrence of their management and came up with a process to dry the soaked newspapers in a vacuum chamber without completely removing all moisture. Typically, paper must retain at least 6% moisture to avoid leaving it too brittle to handle.

What could have been a disaster turned out well. Working around our own manufacturing schedule, the people in Operations ultimately dried 1,200 irreplaceable back issues of newspapers and restored them to a usable condition. Since then, people from around the country have been in touch with Gene Butler and the UCSD library to learn about the process — a technique which is a significant improvement in paper preservation that will benefit other libraries, too.



A resolution by the San Diego City Council reads in part, "the City Council of the City of San Diego expresses its deep and sincere gratitude to Convair for its valuable service to the library and the community." At the award ceremony (left to right): Patricia Allely, library deputy director; Jack Coffman, director — Fabrication, Convair; David Jahn, UCSD library; and Gene Butler, general supervisor — Operations, Convair.

AIAA Celebrates Christmas

Convair members of the American Institute of Aeronautics and Astronautics are reminded that the annual harbor cruise Christmas celebration will be on Friday, December 9. For reservations, call Jim Peterson, 573-8340. Guests are welcome.



ETR's Picnic a Success

It was fun and games at the 12th annual employees' picnic for Convair Eastern Test Range people this fall. About 450 employees, retirees, family members, and guests attended the day full of activity. Local merchants were also generous in providing prizes to be given away.

Thanks to the picnic crew (easily recognized by their distinctive caps in the photo above) who made this year's picnic a big success.

Some Reminders From Employee Benefits

Medical Coverage. Open enrollment for changing medical coverage plans ends December 9. To change from one medical plan to another, employees must contact the Employee Benefits offices during the following hours:

Kearny Mesa, 7:00 to 7:30 a.m., and 11:00 a.m. to 4:00 p.m., Monday through Friday.

Lindbergh Field, 7:00 a.m. to 3:45 p.m., Monday through Thursday, and 12:15 to 3:45 p.m. on Friday.

Plan changes will be effective January 1, 1984. If you elect to continue your present medical plan, no action is necessary.

Special Mailing. Your 1984 prescription drug plan identification cards will be mailed to your home this week. "Open Upon Receipt — Priority Mail" will be printed in red on the window envelope. This I.D. card can be used at any participating pharmacy. Please carry it with you at all times. In the same envelope you will also receive a postage-paid postcard to verify your dependent eligibility for health plan coverage. Follow the instructions enclosed with the postcard and return it no later than January 3, 1984.

Note: Does your paycheck reflect your correct address? If not, address change cards are available at Employee Benefits.

Telephone Notices

On November 23, Pomona Division's 3-digit extensions changed to four digits. Add a 2 to the beginning of their old 3-digit extensions; for example, extension 215 becomes 2215. Pomona's secondary main plant number, 714-629-5111, has been removed from service. To access any Pomona Division extension from Convair, dial 451 + 4-digit number.

Reminder: The "special audible ring" referred to in the Dimension dialing instructions is a ring with lower pitch at the end. It means the extension you have dialed is busy and a call waiting tone has been sent to the called extension.

Holiday Funds Available at PLFCU

Point Loma Federal Credit Union reminds its Convair members that PLFCU makes holiday loans for up to \$10,000 per member at 15% (annual percentage rate) for 12 to 48 months depending on the loan amount. Pick up a loan application at Employee Benefits or at PLFCU.

Security Tip

The term "foreign travel," as it applies to the DoD industrial security program, is defined as travel to or from a communist country. This also includes attendance at a meeting, anywhere in the world, where citizens of communist countries will be present. This kind of travel by DoD-cleared employees requires a security briefing and debriefing. Contact Security and Investigation before you leave.

From the Health-Fitness Center

WORKOUT. Class starts on January 4, 4:30 p.m., and meets on Monday, Wednesday, and Friday for five weeks in CRA clubhouse room A.

Jazz-X-Ercise. Begins January 4, 5:30 p.m. Class meets on Monday, Wednesday, and Friday for five weeks in CRA clubhouse room A.

Weight Loss Contest. A 30-day weight loss contest begins on January 5. Meet in CRA clubhouse room A from 5:00 to 6:00 p.m.

Rock A'Robics. New five-week sessions begin on January 9. On Mondays and Wednesdays, class meets at 4:30 p.m., on Tuesdays and Thursdays at 4:30 and 5:30 p.m.

For more information, call the HFC at 39921.

Employment

For the week ending November 18, employment was 11,020.

CONVAIR **Weekly Log**

December 12, 1983

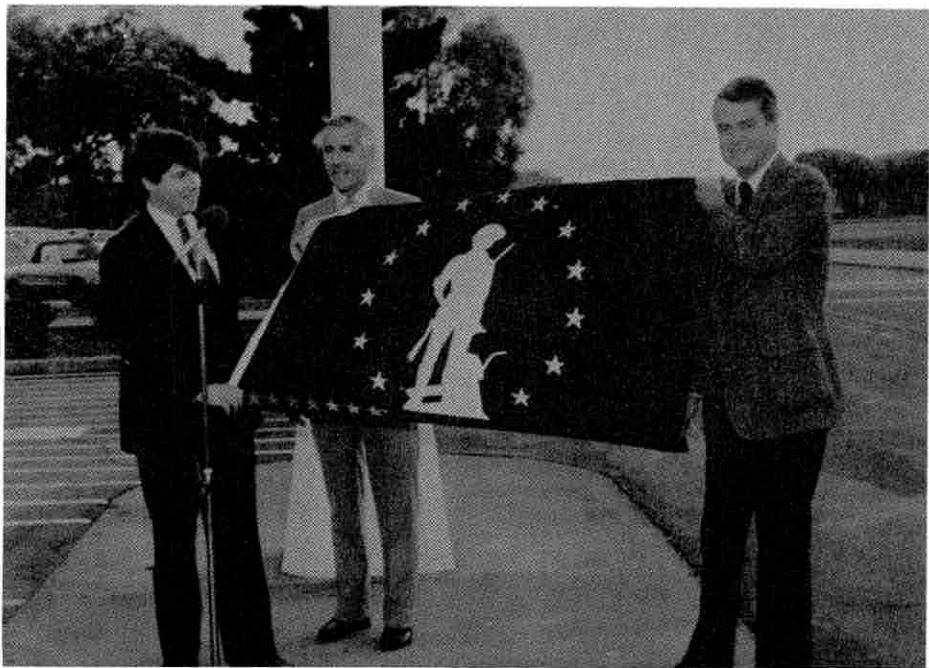
Published by the Convair Division of General Dynamics

Another Banner Month for Employee Suggestors

In November, \$23,140 was awarded to Convair employees for their suggestions including one maximum award of \$10,000 to Rick MacAdam of Technical Publications. Rick won for compiling a master cross-reference listing of AN, MS, NAS, and Convair-threaded fasteners in order to determine at a glance the proper tool for removing the fastener. His idea drastically reduces the time it takes technical writers to describe disassembly procedures. Thirty-one people won awards in excess of \$100, and 50 more won awards up to \$100.

Name (Dept.)	Award(\$)
Brian Albertson (036)	441
Joe Anton (632)	273
Gary Banks (431)	483
Richard Bentler (283)	371
Waymond Bradshaw (036)	367
Andy Capossere (675)	931
Gilbert Chavez (233)	331
Terry Cobb (250)	155
George Coltman (631)	273
Jim Crosby (031)	987
Jim Crush (031)	987
Donald Digenan (050)	130
Bruce Essex (036)	477
Ramon Gamboa (002)	125
John Glover (253)	323
Robert Hatter (761)	125
Glen Johannessen (036)	175
Joseph Leech (952)	338
Harold Leyva (031)	260
Rick MacAdam (264)	10,000
Pat McGarity (067)	105
J.C. Morales (002)	125
Carrolyn Moss (637)	338
Robert Notestime (036)	443
Jean Phillips (193)	1,105
James Polletta (236)	288
Mary Rebbetoy (362)	230
Charles Stroud (759)	225
A.C. Taranto (693)	492
Lance Taylor (038)	185
Gerald Thibault (036)	263

Coming in 1984. The Employee Suggestions people have some special events planned to kick off their 1984 promotion campaign, "Good Ideas Are Everyone's Business." It will begin the first day back to work after the holiday break and continue throughout the year. Suggestors will be eligible for special prizes over and above the regular Employee Suggestion awards. So get ready to make good ideas your business in 1984, and don't be surprised to be greeted at the gates on January 3, 1984, in a very special way.



At the 1984 U.S. Savings Bond kickoff breakfast on December 9, Rep. Bill Lowery presented Convair with a special "Minuteman" flag honoring our 23 years of support for U.S. Savings Bonds at a 50% or greater level. General Manager John McSweeny proudly accepted the flag and said it would fly with the Tomahawk flag — both represent the hard work and participation of employees. McSweeny will serve as chairman of the 1984 San Diego U.S. Savings Bond campaign with Rep. Lowery (left), cochairman, and George Gildred (right), San Diego County volunteer chairman. Convair was also given special recognition by the U.S. Treasury Department for its 93.2% participation in 1983.



Rick MacAdam (center) is congratulated by Charlie Johnson, supervisor — Space Programs Editing, and George Roos, director — ILS.

Congressmen Tour Convair Briefed on Space Programs

Four members of the House Science and Technology Committee visited Convair's Kearny Mesa facility on December 7: Rep. Harold Volkmer (D-Mo), Rep. Larry Winn (R-Kans), Rep. Rod Chandler (R-Wash), and Rep. Bill Lowery (R-Calif). During the visit, they were briefed on Convair's space programs and toured the Shuttle/Centaur full-scale mockup.

January NMA Meeting

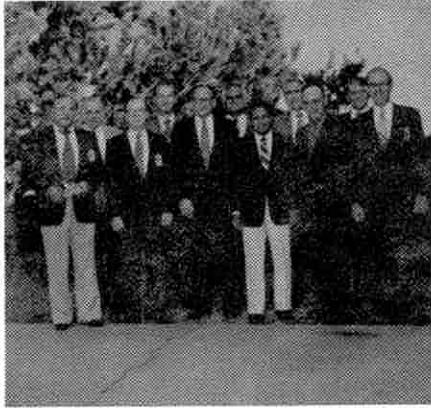
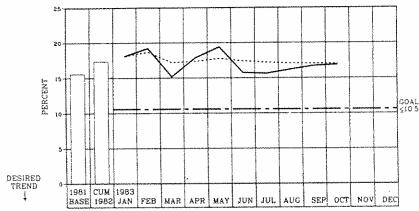
On January 19, the Operations organization is sponsoring the State of the Division meeting. General Manager John McSweeny will address what has traditionally been a sell-out meeting. The meeting will be at the Sheraton Harbor Island Hotel. Flyers will be out soon with further details.

Making a Difference

QIP Update: Inspection Escapes

The accuracy of visual and dimensional inspection is critical to ensure that nonconforming hardware is detected at the point of origin. Nonconformances processed on to other departments represent added cost and indicate inefficiencies in the inspection process. This measurement determines, on a monthly basis, the number of QARs (quality action requests) that bear prior department responsibility as a percentage of the total number of QARs. The QIP goal is to keep these "inspection escapes" at or below 10.59%. The most recent data shows the October percentage to be 16.87%. While the cumulative average trend for the first ten months shows a slight improvement, the percentage continues to be in excess of the goal.

Inspection Escapes



Service Award Breakfast. Employees with 35 or 40 years of service were honored at a service award breakfast on November 18, hosted by General Manager John McSweeny. Front row, from left to right: Raul Armenta, (35 years), James Caldwell (40), Albert Mooney, Jr. (40), Cirilio "Lilo" Rojas (40), John Hannibal (35), and William Hammond (35). Back row: James Greenwald (35), Chuck Bohle (staff), Dan Da Pra (staff), John McSweeny, and Ken Lake (staff).

A Word About Smoking

Even though smoking is a matter of individual choice, at Convair there are some guidelines about smoking and how it relates to the health and safety of employees. Briefly these guidelines are:

In Captive Areas. Smoking is not allowed in areas where employees have little choice about moving or leaving. This includes elevators, libraries, projection rooms, interplant buses, restrooms, graphic and photo reproduction waiting areas, and medical service reception areas. These areas are posted.

In Conferences. Smokers are asked not to smoke during the first hour of any meeting. After that, whether smoking is allowed or not is at the discretion of the chairperson of the meeting.

In Office Areas. Smokers and supervisors should be aware of how smoke affects nonsmokers. If necessary, and if feasible, supervisors should establish smoke-free areas in their departments.

For Safety. Section 7-1 of the Safety Manual describes where smoking is not allowed because of production or safety requirements.

Because many situations in the workplace are not governed by hard-and-fast rules, employees and supervisors should be aware of the interpersonal skills necessary to find ways of accommodating the needs of smokers and nonsmokers.

Holiday Hours for PLFCU

All branches of the Point Loma Federal Credit Union will be closed on Saturday, December 24; Monday, December 26; Saturday, December 31; and Monday, January 2.

Another Patent to Convair Inventor
U.S. patent 4,413,349 was recently granted to Richard Bailey, an engineer in the Energy Systems area. The patent was granted for a method and apparatus that measures the contour of a surface without contacting the surface.

Lindbergh Field Gets Cashier

A cashier's office will open today at Lindbergh Field. The office is located at column N-1 on the mezzanine of building 1 and will be open from 9:00 a.m. to noon and 1:00 to 4:00 p.m., Monday through Friday. The telephone number is 27666.



EXCEL: Pride Makes the Difference.

Allen Slagle, a missile mechanic group leader working in the strongback area of TEL assembly at Plant 19, was recently presented with an EXCEL award for his leadership and contributions to the second-quarter effort to meet schedule and quality criteria in the TEL program. On hand to congratulate Allen were Roger Rote, Plant 19 superintendent, and Mike Zaragoza, Operations supervisor on the TEL/LCC program. Congratulations, Allen!

Material Handling Provides Hotlines

Industrial Engineering and Material Handling ensures that parts being built in the factory are transported correctly when they move from one department to another. They have instituted two hotline telephone numbers to help make sure that material is handled in the right way. If you are in doubt about whether a part being moved is properly protected, call the hotline number at your plant for an immediate response:

Lindbergh Field, Plant 19, Harbor Drive: Call 27979.

Kearny Mesa and Sycamore Canyon: Call 35858.

From the Health-Fitness Center

Workout. Starts January 4, 4:30 p.m., CRA clubhouse room A.

Jazz-X-Ercise. Starts January 4, 5:30 p.m., CRA auditorium.

Weight Loss Contest. Meet January 5, 5:00 p.m. CRA clubhouse room A for introduction.

Rock A'Robics. Starts January 9. Call HFC for class times.

Shape-Up. Starts January 30 LF 4:45 p.m., KM, 4:30 p.m.

Yoga. Starts January 10.

Graduate Shape-Up Program. Ongoing on Mondays, Wednesdays, and Fridays, 4:30 p.m., Missile Park.

For more information, call the HFC at 39921.

Employment

As of December 2, employment was 11,013.

CONVAIR

Weekly Log

December 19, 1983

Published by the Convair Division of General Dynamics

As we approach the holidays and the new year, I would like to reflect on the year that is coming to a close. The year gave us many accomplishments to be proud of and provided fresh opportunities that will continue into 1984 and beyond.

1983 saw the deployment of Tomahawk, an event toward which we have been working for many years. 1983 saw the continued success of Atlas and Centaur, as well as the Shuttle for which we built the mid-fuselage. Our energy programs met key milestones and won new business opportunities for us. Aircraft subcontracts kept us active in an industry we have been involved with since the earliest days of the company. During 1983, we completed the most significant facilities expansion program in our history. And there are almost 1,500 more of us than at the beginning of 1983.

All Convair people contributed to the successes of this year, and it will take the efforts of all of us to meet our commitments for 1984. I would like 1984 to be the year when pride in our work and dedication to quality create an even higher standard of excellence at Convair. We can do this by continuing to build on the positive achievements of 1983.

Finally, the division staff joins me in extending my best wishes to everyone for a happy and a safe holiday with your family and friends.

THE YEAR IN THE CRUISE MISSILE PROGRAM

GLCM: We Did It!

1983 was a most significant year for the Tomahawk program. At the top of the list was achieving **initial operational capability (IOC)**. Although the Air Force has not yet officially declared GLCM to be operational, everything at main operating base 1 (MOB 1) is proceeding to plan and on schedule, one which was established in December 1979... Our prime responsibility in transitioning from development to rate production was

to deliver twenty **Tomahawk all-round units**, six **transporter erector launchers**, and four **launch control centers** to the Air Force. This was accomplished on schedule... In addition to the key hardware delivery requirement, there were several other critical elements necessary to achieve IOC, including the delivery of main operating base training and support equipment. Convair support teams were established in the U.S. and at main operating bases, and total system integration support was supplied by the **GLCM System Integration Laboratory (GSIL)**.

Tomahawk Scoreboard

To date, there have been 17 Tomahawk flight tests and 15 successes. All variants of the missile — **land-attack** and **antiship** — have flown, and we have had successful launches from submarines, surface ships, and the GLCM TEL... 1983 highlights included 14 consecutive successes, the best in Tomahawk history, and the picture-perfect flight from the battleship *New Jersey*.

Production Highlights

1983 marked the real beginning of Tomahawk cruise missile production. As of December 12, we delivered 67 production missiles and 38 of the 40 missiles required to support the first two main operating bases in Europe... We expect to complete our December production requirements on or ahead of schedule for all versions that are now in work.

THE YEAR IN SPACE PROGRAMS

Meeting the Challenge of Space

1983 saw Space Programs expanding on the success of current programs and planning and building for future growth... **Shuttle/Centaur** is now a joint NASA/Air Force program with two vehicles and all supporting hardware and software under a Convair contract for both customer agencies. Plans are being prepared to add several major new missions to the Shuttle/Centaur flight schedule, and the list is expected to grow during the coming years... One more success was tallied for **Atlas/Centaur** when the INTELSAT V Flight 6 communications satellite was launched in May, bringing the INTELSAT spacecraft launch total to 20 over 12 years. The flight of **AC-16** marked the last launch of **Atlas D/Centaur**, since future INTELSAT and FLTSATCOM spacecraft flights will use the new **Atlas G/Centaur** — a lengthened, higher-capacity vehicle that also serves as the basis for the **Commercial**

FLIP

Atlas/Centaur plans, which made substantial progress during 1983. The Atlas programs continued their tradition of success with three **Atlas E** and two **Atlas H** launches from Vandenberg AFB.

As a historical note, December 18 was the 25th anniversary of the launch of Atlas 10B, which broadcast President Eisenhower's message of peace from earth orbit.

Several key events in the Advanced Space Programs area added to our stature in U.S. space programs. Among them are a DARPA study of the **hybrid bistatic radar** and winning the first technology development contract from INTELSAT for an **advanced deployable antenna system**... We continued to prepare for the **space station program**, and the **spacecraft maneuvering module**, which was test fired just a year ago, is being used as the basis for our work on the new NASA orbital maneuvering vehicle... A major study effort has been under way to define a new, large **Atlas II**, which, in conjunction with one of the Centaur configurations, may become the next-generation, large expendable launch vehicle. These and many other programs provide us with real challenges in space — challenges that we will meet in 1984 and in the years ahead.

THE YEAR IN AIRCRAFT PROGRAMS

Deliveries on Schedule

Convair delivered eight **KC-10 fuselages** to McDonnell Douglas in 1983... The KC-10 has demonstrated its significant cargo- and fuel-carrying capability to the Air Force, which has signed an agreement to purchase 35 additional KC-10s. This agreement will increase our fuselage production rate in the second half of 1984 and will cover our production into early 1987. Future Air Force orders should extend our KC-10 fuselage production into the 1990s.

We delivered 37 shipsets of **767 engine struts** to Boeing in 1983, about the same quantity delivered in 1982. The commercial airliner market has weakened, and we are slowing our deliveries in 1984 to 25 shipsets. Boeing expects the 767 market to strengthen in 1985, resulting in an increase in strut deliveries.

Twenty-five years ago...

"This is the President of the United States speaking. Through the marvels of scientific advance, my voice is coming to you from a satellite circling in outer space. Through this unique means, I convey to you and to all mankind America's wish for peace on earth and good will toward men everywhere."

*President Dwight D. Eisenhower
December 18, 1958*

THE YEAR IN ENERGY SYSTEMS

New Business for Convair

We maintained our strong position in the large superconducting magnet business by winning the **Production Magnet System II** in 1983. This 6-tesla, 210-ton magnet will be designed in 1984, fabricated beginning in 1985, and delivered in mid-1987. (Our first magnet for TRW, the **PMS-I**, has been operating continuously since September 1981.)... The 47-ton superconducting magnet for the Oak Ridge National Laboratory **Large Coil program** was delivered in June and will begin cryogenic and magnetic testing early in 1984... The two development magnets for the **Elmo Bumpy Torus program** were tested in 1983 and met all performance objectives. The third magnet will be delivered in February 1984... We completed the 12 solenoids for the **Mirror Fusion Test Facility** and shipped them to Lawrence Livermore National Laboratory in September — three months ahead of schedule... In December, final design review for the two **transition coils** and two **axicell coils** was successfully completed... The 18-month **advanced mirror fusion reactor power plant study** with Lawrence Livermore National Laboratory was completed, and we are performing a conceptual design study to develop **hybrid high-field magnet technology** for a fusion power demonstration experiment... Convair entered another area of the superconducting magnet business in 1983 by obtaining a contract for conceptual design of a cryostat for **advanced accelerator magnets**. This joint effort with the Lawrence Berkeley Laboratory will continue in 1984.

THE YEAR IN FACILITIES

A New Look for Convair

During 1983, we completed the most significant facilities expansion program in Convair's history — 621,000 square feet of new construction was completed as part of a master facility plan to expand division and manufacturing capabilities... Two hundred and fifty major machines were moved and consolidated into the new 30-foot-high building 1 addition at Lindbergh Field... Double- and triple-gantry CNC long-bed profilers, large CNC multi-axis profilers, CNC machining centers, and cruise missile electron beam welders and fabrication machines are now arranged in an impressive, modern machine shop... The support function offices are now located on two new mezzanines over the machine shop... Warehousing has been consolidated into building 4, and new handling equipment now allows material to be stacked up to 24 feet.

A new automated, conveyorized high-density storage facility is on order for the Cruise Missile program at Kearny Mesa. The Cruise Missile engineering and program offices and the assembly and test operation areas were successfully colocated in building 5. Space Program offices are now under one roof in building 26. Core engineering people moved into their own new building... Over 3,000 people at the Kearny Mesa plant were relocated as a result of the major expansion program.

In addition to new construction projects, Convair's San Diego facilities underwent many major improvements... Energy Systems is now located at the Harbor Drive Facility. Metalbond and Composites are now together in building 3 at Lindbergh Field, with new layup rooms and new equipment.